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GenCore version 4.5
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OM protein - protein search, using sw model

Run on: August 6, 2001, 09:33:05 ; Search time 32.37 Seconds

(without alignments)
580.582 Million cell updates/sec

Title: US-09-524-531a-15

Perfect score: 1637
Sequence: 1 MALRRPRLRLCARLPDFLL.....VNYIRTDEGDFRHSSEVI 310

Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Sequences: 412676 seqs, 60623988 residues

Number of hits satisfying chosen parameters: 412676

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%

Maximum Match 100%
Listing first 45 summaries

Database :

A.Geneseq_0601:*

- 1: /SIDSR/gcgdata/geneseq/geneseq/AA1980.DAT:*
- 2: /SIDSR/gcgdata/geneseq/geneseq/AA1981.DAT:*
- 3: /SIDSR/gcgdata/geneseq/geneseq/AA1982.DAT:*
- 4: /SIDSR/gcgdata/geneseq/geneseq/AA1983.DAT:*
- 5: /SIDSR/gcgdata/geneseq/geneseq/AA1984.DAT:*
- 6: /SIDSR/gcgdata/geneseq/geneseq/AA1985.DAT:*
- 7: /SIDSR/gcgdata/geneseq/geneseq/AA1986.DAT:*
- 8: /SIDSR/gcgdata/geneseq/geneseq/AA1987.DAT:*
- 9: /SIDSR/gcgdata/geneseq/geneseq/AA1988.DAT:*
- 10: /SIDSR/gcgdata/geneseq/geneseq/AA1989.DAT:*
- 11: /SIDSR/gcgdata/geneseq/geneseq/AA1990.DAT:*
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- 13: /SIDSR/gcgdata/geneseq/geneseq/AA1992.DAT:*
- 14: /SIDSR/gcgdata/geneseq/geneseq/AA1993.DAT:*
- 15: /SIDSR/gcgdata/geneseq/geneseq/AA1994.DAT:*
- 16: /SIDSR/gcgdata/geneseq/geneseq/AA1995.DAT:*
- 17: /SIDSR/gcgdata/geneseq/geneseq/AA1996.DAT:*
- 18: /SIDSR/gcgdata/geneseq/geneseq/AA1997.DAT:*
- 19: /SIDSR/gcgdata/geneseq/geneseq/AA1998.DAT:*
- 20: /SIDSR/gcgdata/geneseq/geneseq/AA1999.DAT:*
- 21: /SIDSR/gcgdata/geneseq/geneseq/AA2000.DAT:*
- 22: /SIDSR/gcgdata/geneseq/geneseq/AA2001.DAT:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	1637	100.0	310	21	Human confuency r
2	1637	100.0	310	21	Human PRO1868 prot
3	1637	100.0	310	21	Human PRO1868 an A33 an
4	1637	100.0	310	22	Human PRO1868 prot
5	1637	100.0	310	22	Secreted protein e
6	1637	100.0	310	22	Secreted protein e
7	1637	100.0	310	22	Secreted protein e
8	1637	100.0	311	21	Human secreted pro
9	1637	100.0	311	21	Human secreted pro
10	1637	100.0	311	21	Human secreted pro
11	1637	100.0	339	22	Gene #13 associate

12	1629	99.5	310	21	AA196294	Human IGFAM-6 immu
13	1498	91.5	285	21	AA339254	Human secreted pro
14	1409	86.1	310	21	AA327272	Human confuency r
15	1409	86.1	310	21	AA327278	Murine confuency
16	488	29.8	298	19	AA85457	Secreted protein e
17	488	29.8	298	22	AAU00512	Human junctional a
18	481	29.4	298	19	AAW75220	Human secreted pro
19	478.5	29.2	298	21	AAW72733	Human confuency r
20	478.5	28.2	312	20	AAW72735	Murine confuency
21	461.5	28.2	312	20	AAW08060	Human PRO245 prote
22	461.5	28.2	312	20	AAW23324	A33 related antige
23	461.5	28.2	312	20	AAW13354	Amino acid sequenc
24	461.5	28.2	312	21	AAW33421	Human PRO245 prote
25	461.5	28.2	312	21	AAW24401	Human PRO245 prote
26	461.5	28.2	312	21	AAW70668	Human PRO245 prote
27	461.5	28.2	312	22	AAW80222	Human PRO245 prote
28	461.5	28.2	312	22	AAW53081	Human angiogenesis
29	460	28.1	89	20	AAW11472	Human 5' EST secre
30	457.5	27.9	300	19	AAW61380	Mouse junctional a
31	457.5	27.9	300	20	AAW23325	A33 related antige
32	456.5	27.9	312	22	AAW50904	Human PRO245 prote
33	446	27.2	280	21	AAW39253	Gene 15 human secr
34	424	25.9	289	20	AAW08071	Human PRO307 prote
35	424	25.9	289	20	AAW23321	Amino acid sequenc
36	424	25.9	289	20	AAW13364	Amino acid sequenc
37	424	25.9	289	20	AAW74464	F11 antigen protei
38	424	25.9	289	21	AAW24405	Human PRO301 prote
39	424	25.9	289	21	AAW53344	Human PRO301 antit
40	424	25.9	289	21	AAW70670	Human PRO301 prote
41	424	25.9	289	21	AAW76011	Human A33 receptor
42	424	25.9	289	21	AAW76076	Human A33 receptor
43	424	25.9	289	22	AAW31202	Amino acid sequenc
44	424	25.9	289	22	AAW80232	Human PRO301 prote
45	424	25.9	289	22	AAW5950	Skin cell protein,

ALIGNMENTS

RESULT 1	AAW27276	standard; Protein: 310 AA.
ID	AAW27276:	
AC	AAW27276:	
XX		
DT	23-FEB-2001 (first entry)	
XX		
DE	Human confuency regulated adhesion molecule 1 #2.	
XX		
KW	Immunoglobulin superfamily; Ig Sf; vascular adhesion molecule;	
KW	Inflammation; cancer; wound; angiogenesis; human;	
KW	confuency regulated adhesion molecule 1; CRAM-1; JAM-2.	
XX		
OS	Homo sapiens.	
XX		
PN	WO200053749-A2.	
XX		
PD	14-SEP-2000.	
XX		
PF	13-MAR-2000; 2000MO-EP02219.	
XX		
PR	11-MAR-1999; 99EP-0200746.	
XX		
PA	(RMFD-) RMF DICTAGENE SA.	
XX		
PI	Imhof BA, Aurrand-Lions M;	
XX		
DR	WPI; 2000-587436/55.	
XX		
DR	N-PSDB; AAA95306.	
XX		
PT	Isolated human Confuency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or	
PT	CRAM-2) polypeptide, useful for treatment of tumors, inflammation	
PT	reactions and modulating vascular permeability -	

CC In the isolation of human PRO sequences. AAC58579 to AAC58642 and
 CC AAB33414 to AAB33477 represent human PRO polynucleotide and protein
 CC sequences given in the exemplification of the present invention.
 XX
 SO Sequence 310 AA:

Query Match 100.0%; Score 1637; DB 21; Length 310;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLALCARLPDFILLFRGLIGAVNLKSSNRTPVVOEFSVLSCTITDSQT 60
 DB 1 malrrprrlcarlpdfillfrgcllgavnlkssnrtpvvoefesvlsctitdsqt 60
 QY 61 SDRRIEMKKIODEQTTVPFNDKIOGLAGRAELIKTSIKINWTRDSALYCEVVAR 120
 D 61 sdrriemkkidqdeqtlvffndkioqlagraeligtstikinvtrdsalycevar 120
 QY 121 NDRKEIDEIVIELTVQKPYTPVCRVPKAVPGKMATLHCQESGHRPHYSWYRNDVPL 180
 D 121 ndrkeideivieltvqkpytpvcrvpkavpgkmatlhqeseghrphyswyrndvpl 180
 QY 181 PTDSRANPRRRNSSFHLNSTGTLVFAVHKDSCGYTCIASNDAGSARCEBDEMEYDL 240
 DB 181 ptdsranprrrnssfhlNSTGTLVFAVHKDSCGYTCIASNDAGSARCEBDEMEYDL 240
 QY 241 NIGGIIGVVLAVLALITLITGCAVRGTYFINNKDGSYKRPDGVNTRTDEEG 300
 DB 241 niggiigvvlavlaLITLITGCAVRYTFINNKDGSYKRPDGVNTRTDEEG 300
 QY 301 DFRHKSSFEVI 310
 DB 301 dfhkssfv1 310

RESULT 3

ID AAY96735 standard; Protein; 310 AA.

XX AAY96735;

XX 26-SEP-2000 (first entry)

XX PRO1868, an A33 antigen homologue.

XX PRO1868: A33 antigen; secreted protein; transmembrane protein;
 KM anti-inflammatory; cytosolic; recombinant production; gene therapy.

XX Homo sapiens.

XX Location/Qualifiers

FT Peptide 1..30

FT /label= Signal_peptide

FT Modified-site 26..31

FT /note= "N-myristoylation site"

FT Modified-site 69..77

FT /note= "Tyrosine kinase phosphorylation site"

FT Modified-site 104..107

FT /note= "N-glycosylation site"

FT Modified-site 106..109

FT /note= "Casein kinase II phosphorylation site"

FT Modified-site 107..110

FT /note= "cAMP- and cGMP-dependent protein kinase phosphorylation site"

FT Modified-site 192..195

FT /note= "N-glycosylation site"

FT Modified-site 215..220

FT /note= "N-myristoylation site"

FT Modified-site 226..231

FT /note= "N-myristoylation site"

FT Domain 243..263

FT /label= transmembrane_domain

FT Modified-site 243..248
 FT /note= "N-myristoylation site"
 FT Modified-site 244..249
 FT /note= "N-myristoylation site"
 FT Modified-site 262..267
 FT /note= "N-myristoylation site"
 FT Modified-site 296..299
 FT /note= "Casein kinase II phosphorylation site"

PN W0200036102-A2.

PD 22-JUN-2000.

XX 01-DEC-1999;

XX 99MO-US28634.

XX 16-DEC-1998;

PR 98US-0112851.

PR 16-DEC-1998;

PR 98US-0113145.

PR 22-DEC-1998;

PR 98US-0113511.

PR 12-JAN-1999;

PR 99US-0115558.

PR 12-JAN-1999;

PR 99US-0115733.

PR 09-FEB-1999;

PR 99US-0119341.

PR 10-FEB-1999;

PR 99US-0119537.

PR 12-FEB-1999;

PR 99US-0119965.

PR 02-JUN-1999;

XX 99MO-US12252.

PA (GETH) GENENTECH INC.

PI Botstein D, Desnoyers L, Ferrara N, Fong S, Gao W, Goddard A;

PI Gurney AL, Pan J, Roy MA, Stewart TA, Tumas D, Watanabe CK;

PI Wood WI;

XX WPI: 2000-431586/37.

DR N-PDB; AAB51265.

XX Isolated nucleic acid molecule encodes a PRO polypeptide which is a

PT transmembrane polypeptide

XX Claim 1; Fig 14; 154pp; English.

XX This is PRO1868, a putative homologue of A33 antigen, a known

CC colorectal cancer-associated marker. The invention concerns novel

CC secreted and transmembrane proteins, designated PRO polypeptides. The

CC cDNA and gene sequences are useful in the recombinant production of PRO

CC polypeptides, as a hybridization probe to screen libraries to isolate

CC cDNAs with sequence identity to PRO polypeptides or to map the gene

CC encoding the PRO polypeptides and analyzing genetic disorders. The

CC cDNA/gene can also be used to produce transgenic animals useful for the

CC development and screening of therapeutically useful reagents. They can

CC also be used in gene therapy, e.g. to replace a defective gene.

SO Sequence 310 AA:

Query Match 100.0%; Score 1637; DB 21; Length 310;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;

Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLALCARLPDFILLFRGLIGAVNLKSSNRTPVVOEFSVLSCTITDSQT 60
 DB 1 malrrprrlcarlpdfillfrgcllgavnlkssnrtpvvoefesvlsctitdsqt 60
 QY 61 SDRRIEMKKIODEQTTVPFNDKIOGLAGRAELIKTSIKINWTRDSALYCEVVAR 120
 DB 61 sdrriemkkidqdeqtlvffndkioqlagraeligtstikinvtrdsalycevar 120
 QY 121 NDRKEIDEIVIELTVQKPYTPVCRVPKAVPGKMATLHCQESGHRPHYSWYRNDVPL 180
 DB 121 ndrkeideivieltvqkpytpvcrvpkavpgkmatlhqeseghrphyswyrndvpl 180
 QY 181 PTDSRANPRRRNSSFHLNSTGTLVFAVHKDSCGYTCIASNDAGSARCEBDEMEYDL 240
 DB 181 ptdsranprrrnssfhlNSTGTLVFAVHKDSCGYTCIASNDAGSARCEBDEMEYDL 240

QY 241 NIGGIIGVLLVAVLALITLIGICAYRRGYFINKKODESYKPNKPGKPDGVNYIRTDEG 300
 DB 241 nlggllggvllvavllalittlgicayrrgyfinkkqdesyknpgkpgdgvnyirtdeeg 300
 QY 301 DFRHKSFEVI 310
 DB 301 dfrhksfvl 310

RESULT 4

AAB80272
 ID AAB80272 standard; Protein: 310 AA.

XX AAB80272;

XX 24-APR-2001 (first entry)

XX Human PRO1868 protein.

XX Human; PRO: dermatological; antipsoriatic; cytostatic; antiinflammatory;
 KW antiparkinsonian nootropic; neuroprotective; vulnerary; cardiact;
 KW antiangiogenic; vasotropic; antisthmatic; antirheumatic; cancer;
 KW antiarthritic; antiinfectivity; antidiabetic; antiviral; diabetes;
 KW ophthalmological; gene therapy; skin disease; gastrointestinal disorder;
 KW ischaemia; inflammation.

OS Homo sapiens.

PM WO200104311-A1.

PD 18-JAN-2001.

PE 22-FEB-2000; 2000WO-US04414.

PR 07-JUL-1999; 99US-0143048.
 PR 26-JUL-1999; 99US-0145698.
 PR 28-JUL-1999; 99US-0146222.
 PR 08-SEP-1999; 99WO-US20594.
 PR 13-SEP-1999; 99WO-US20944.
 PR 15-SEP-1999; 99WO-US21090.
 PR 15-SEP-1999; 99WO-US21547.
 PR 05-OCT-1999; 99WO-US23089.
 PR 29-NOV-1999; 99WO-US28214.
 PR 30-NOV-1999; 99WO-US28313.
 PR 16-DEC-1999; 99WO-US30095.
 PR 20-DEC-1999; 99WO-US30911.
 PR 05-DEC-1999; 99WO-US30999.
 PR 05-JAN-2000; 99WO-US00219.

XX (GETH) GENENTECH INC.

XX Sibenzi AJ, Botstein D, Desnoyers L, Eaton DL, Ferrara N;

PI Filvaroff E, Fong S, Gao W, Gerber H, Gerritsen ME, Goddard A;

PI Godowski PJ, Grimaldi CJ, Gurney AL, Hillan KJ, Kijavlin IJ;

PI Mather JP, Pan J, Paoni NF, Roy MA, Stewart TA, Tumas D;

PI Williams PM, Wood WI;

XX MPI: 2001-081051/09.

DR N-PSDB; AAF72433.

XX Sixty one nucleic acids encoding PRO polypeptides which are useful in

XX the treatment of skin diseases (e.g. psoriasis), cancers (e.g. lung

XX squamous cell carcinoma) and neurodegenerative diseases (e.g.

XX Alzheimer's disease)

CC Claim 1; Fig 124; 393pp; English.

CC Parkinson's disease), wound repair, cardiovascular disorders (e.g.
 CC endometrial bleeding angiogenesis, ischemias such as coronary
 CC ischemia, atherosclerosis), inflammatory disorders (e.g. asthma,
 CC rheumatoid arthritis, multiple sclerosis), infertility, AIDS and
 CC diabetes and retinal disorders such as retinitis pigmentosa.
 CC The PRO nucleic acids have applications in molecular biology, including
 CC use as hybridization probes, and in chromosome and gene mapping.

SQ Sequence 310 AA:

Query Match 100.0%; Score 1637; DB 22; Length 310;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLRLCARLPDFELLFRGCLTGAVALKSSNRTPVQFESEVSLCITDSTQ 60
 DB 1 malrrprrlrcarlpdfellfrgcllgavnlkssnrtpvqfesevslciltstqt 60
 QY 61 SDPRLEWKRIODEQTTVYFEDNKGIDLAGRAEIIKSTSLKIMNTYRDSALYCEVVAR 120
 DB 61 sdprlewkriqdeqttvyfndkigdlagrelilgktslkimvtrdsalyrevar 120
 QY 121 NDRKEIDEIVIELVQVKEVTPVCAVPAVYKMATLHCQESGHPRHPSWYNDVPL 180
 DB 121 ndrkeideivielvqvkevtprcvrpkavpygkmatlhcqesghprphyswyrndvp 180
 QY 181 PTDSSANPFRFNSFHLNSETGLVFTAVHKDSDGYCIAINDGSARCEQDEMEVVDL 240
 DB 181 ptdsranpfrfnsfhlntseglvftavhkdsgyyciasndgsarceqemevydl 240
 QY 241 NIGGIIGVLLVAVLALITLIGICAYRRGYFINKKODESYKPNKPGKPDGVNYIRTDEG 300
 DB 241 nlggllggvllvavllalittlgicayrrgyfinkkqdesyknpgkpgdgvnyirtdeeg 300
 QY 301 DFRHKSFEVI 310
 DB 301 dfrhksfvl 310

RESULT 5

AAB80383
 ID AAB80383 standard; Protein: 310 AA.

XX AAB80383;

XX 24-APR-2001 (first entry)

XX Secreted protein encoded by gene #13.

XX Secreted protein; human; autoimmune; hyperproliferation;

XX cardiovascular; cerebrovascular; infection; food.

XX Homo sapiens.

XX WO200107459-A1.

XX 01-FEB-2001.

XX 20-JUL-2000; 2000WO-US19735.

XX 23-JUL-1999; 99US-0145220.

XX (HUMA-) HUMAN GENOME SCI INC.

XX Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore PA;

XX Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsoulis GA;

XX MPI: 2001-123261/13.

XX New isolated nucleic acid encoding 29 secreted proteins, for

XX diagnosing, preventing and treating e.g. autoimmune,

XX hyperproliferative, cardiovascular, and ocular diseases or disorders

PT and microorganism infections -
 XX
 PS Claim 11; Page 538-539; 601pp; English.
 XX
 CC The present invention relates to 29 human secreted proteins. The
 CC invention is used to prevent autoimmune diseases e.g. rheumatoid
 CC arthritis, hyperproliferative disorders e.g. neoplasms of the
 CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
 CC cerebrovascular disorders e.g. cerebral ischemia, angiodenesis,
 CC nervous system disorders e.g. Alzheimer's disease, infections
 CC caused by bacteria, viruses and fungi and ocular disorders e.g.
 CC corneal infection. Also used in food preparations.
 XX
 SQ Sequence 310 AA;
 Query Match 100.0%; Score 1637; DB 22; Length 310;
 Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 Q 1 MALRRPRLRLCARLPDFELLFRGCLIGAVNLKSSNRTPVQEFESVELSCIITDSQT 60
 DB 1 malrrprlrlcarlpdfflllfrgcllgavnlkssnrtcpvqefesvelscitdsqt 60
 QY 61 SDRPIEMKKIQDEQTYVFFDNKIQDLAGRAELIGKTSIKINWTRDSALYRCEVVAR 120
 DB 61 sdprlewkkiqdeqtyvffdnkiqdglaagraeligktsikimwtrdsalyrcevar 120
 QY 121 NDRKEIDEIYIELTVQKPTPCRVKAVPVGKMATLHCQESGHRPHYSWRNDVPL 180
 DB 121 ndrkeideiyieltvqkptpcrvkavpvgkmatlhcqeseghrphyswyrndvpl 180
 QY 181 PTDSRANPREFNSSFHLNSETGLVFTFAVHKDSDGOYCIASNDAGSARCEOEEMEYIDL 240
 DB 181 ptdsranprefnssfhlnsetglvftavhkdsgyyciasndagsarceogemeaydl 240
 QY 241 NIGGIIGVLVLAVALITLIGICCAVRGYFINNKODGESYKPGKPDGVNIRITDEEG 300
 DB 241 niggiigvllvavalltligiccayrgrgfinnkqdgesyknpgkpdgvnyirideeg 300
 QY 301 DFRHKSSFVI 310
 DB 301 dfrhkssfvl 310
 RESULT 6
 ID AAB80408 standard; protein; 310 AA.
 XX AAB80408;
 DT 24-APR-2001 (first entry)
 DE Secreted protein encoded by gene #38.
 XX
 KM Secreted protein; human; autoimmune; hyperproliferation;
 KM cardiovascular; cerebrovascular; infection; food.
 OS Homo sapiens.
 XX
 PN WO200107459-A1.
 PD 01-FEB-2001.
 PF 20-JUL-2000; 2000MO-US19735.
 PR 23-JUL-1999; 99US-0145220.
 PA (HUMA-) HUMAN GENOME SCI INC.
 PI Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore PA;
 PI Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsoulis GA;
 XX

DR WPI; 2001-123261/13.
 XX
 PT New isolated nucleic acid encoding 29 secreted proteins, for
 PT diagnosing, preventing and treating e.g. autoimmune,
 PT hyperproliferative, cardiovascular, and ocular diseases or disorders
 PT and microorganism infections -
 XX
 PS Claim 11; Page 557-558; 601pp; English.
 XX
 CC The present invention relates to 29 human secreted proteins. The
 CC invention is used to prevent autoimmune diseases e.g. rheumatoid
 CC arthritis, hyperproliferative disorders e.g. neoplasms of the
 CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
 CC cerebrovascular disorders e.g. cerebral ischemia, angiodenesis,
 CC nervous system disorders e.g. Alzheimer's disease, infections
 CC caused by bacteria, viruses and fungi and ocular disorders e.g.
 CC corneal infection. Also used in food preparations.
 XX
 SQ Sequence 310 AA;
 Query Match 100.0%; Score 1637; DB 22; Length 310;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 QY 1 MALRRPRLRLCARLPDFELLFRGCLIGAVNLKSSNRTPVQEFESVELSCIITDSQT 60
 DB 1 malrrprlrlcarlpdfflllfrgcllgavnlkssnrtcpvqefesvelscitdsqt 60
 QY 61 SDRPIEMKKIQDEQTYVFFDNKIQDLAGRAELIGKTSIKINWTRDSALYRCEVVAR 120
 DB 61 sdprlewkkiqdeqtyvffdnkiqdglaagraeligktsikimwtrdsalyrcevar 120
 QY 121 NDRKEIDEIYIELTVQKPTPCRVKAVPVGKMATLHCQESGHRPHYSWRNDVPL 180
 DB 121 ndrkeideiyieltvqkptpcrvkavpvgkmatlhcqeseghrphyswyrndvpl 180
 QY 181 PTDSRANPREFNSSFHLNSETGLVFTFAVHKDSDGOYCIASNDAGSARCEOEEMEYIDL 240
 DB 181 ptdsranprefnssfhlnsetglvftavhkdsgyyciasndagsarceogemeaydl 240
 QY 241 NIGGIIGVLVLAVALITLIGICCAVRGYFINNKODGESYKPGKPDGVNIRITDEEG 300
 DB 241 niggiigvllvavalltligiccayrgrgfinnkqdgesyknpgkpdgvnyirideeg 300
 QY 301 DFRHKSSFVI 310
 DB 301 dfrhkssfvl 310
 RESULT 7
 ID AAB80409 standard; protein; 310 AA.
 XX AAB80409;
 DT 24-APR-2001 (first entry)
 DE Secreted protein encoded by gene #39.
 XX
 KM Secreted protein; human; autoimmune; hyperproliferation;
 KM cardiovascular; cerebrovascular; infection; food.
 OS Homo sapiens.
 XX
 PN WO200107459-A1.
 PD 01-FEB-2001.
 PF 20-JUL-2000; 2000MO-US19735.
 PR 23-JUL-1999; 99US-0145220.
 XX

PA (HUMA-) HUMAN GENOME SCI INC.
 XX Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore PA;
 PI Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsoulis GA;
 XX WPI: 2001-123261/13.
 DR WPI: 2001-123261/13.
 XX
 PT New isolated nucleic acid encoding 29 secreted proteins, for
 PT diagnosing, preventing and treating e.g. autoimmune,
 PT hyperproliferative, cardiovascular, and ocular diseases or disorders
 PT and microorganism infections
 PS Claim 11; Page 559-560; 601pp; English.
 XX
 CC The present invention relates to 29 human secreted proteins. The
 CC invention is used to prevent autoimmune diseases e.g. rheumatoid
 CC arthritis, hyperproliferative disorders e.g. neoplasms of the
 CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
 CC cerebrovascular disorders e.g. cerebral ischemia, anglogenesis,
 CC nervous system disorders e.g. Alzheimer's disease, infections
 CC caused by bacteria, viruses and fungi and ocular disorders e.g.
 CC corneal infection. Also used in food preparations.
 XX
 SC Sequence 310 AA:
 Query Match 100.0%; Score 1637; DB 22; Length 310;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 QY 1 MALRRPRLRLCARLPDFLLLLFRGCLLGAVALKSSNRTPVVQEFSEVELSCIITDSQT 60
 DB 1 malrrprrlrlcarlpdffllllfrgcllgavnlksnrtpvvqefesvelsciltsgt 60
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 DB 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 QY 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 DB 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 QY 181 PIDSRRANPRFRNSSFHLNSETGLVFTAVHKDSCGYTCIASNDAGSARCEQEMEVYDL 240
 DB 181 pidsranprfrnssfhlhlnsetglvftavhkdsgytciasndagsarceqemeydl 240
 QY 241 NIGGIIGVLLVAVLALTTIGICAYRRGYFINNKODESYKNPKPGVNYIRTDEEG 300
 DB 241 niggiigvllvavlaalltligicayrrgyfinnkqdesyknpgkpgvnyirtdeeg 300
 QY 301 DFRHKSSFYI 310
 DB 301 dfrhksfvl 310
 DE 301 dfrhksfvl 310
 RESULT 8
 AAB38333
 ID AAB38333 standard; Protein; 311 AA.
 XX
 AC AAB38333;
 XX
 DT 31-JAN-2001 (first entry)
 XX
 DE Human secreted protein encoded by gene 13 clone HAPSAT9.
 XX
 KW Immunosuppressive; antiarthritic; antirheumatic; antiproliferative;
 KW cytostatic; cardiant; vasotropic; cerebroprotective; neuroprotective;
 KW nocrotropic; antibacterial; virucide; fungicide; opticalmalogical; human;
 KW vulnerary; gene therapy; infection; secreted protein.
 XX
 XX Homo sapiens.
 XX
 XX WO200061623-A1.
 XX
 XX PN

XX
 PD 19-OCT-2000.
 XX
 XX 06-APR-2000; 2000WO-US08979.
 PR
 XX 09-APR-1999; 99US-0128693.
 PR 26-APR-1999; 99US-0130991.
 XX
 PA (HUMA-) HUMAN GENOME SCI INC.
 XX
 PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;
 PI Lafleur DW, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;
 PI Young PE;
 XX
 DR WPI: 2000-647418/62.
 XX
 PT New nucleic acid molecules encoding 62 human secreted proteins for
 PT diagnosing, preventing, treating or ameliorating medical conditions and
 PT used as food additives or preservatives -
 PS Claim 11; Page 603-604; 716pp; English.
 XX
 CC Sequences AAB38321-B38396 represent the amino acid sequences of 62
 CC human secreted proteins encoded by the genes AAC69512-C69587. The genes
 CC and proteins are useful for preventing, ameliorating or treating medical
 CC conditions, e.g. by protein or gene therapy. The genes are isolated from
 CC a range of human tissues disclosed in the specification. The nucleic
 CC acids, proteins, antibodies and (ant)agonists are useful in the
 CC diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.
 CC rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms
 CC of the breast or liver; (c) cardiovascular disorders e.g. cardiac
 CC arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)
 CC anglogenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)
 CC infections caused by bacteria, viruses and fungi; and (h) ocular
 CC disorders e.g. corneal infection. The polypeptides can also be used to
 CC aid wound healing and epithelial cell proliferation, to prevent skin
 CC aging due to sunburn, to maintain organs before transplantation, for
 CC supporting cell culture of primary tissues, to regenerate tissues and in
 CC chemotaxis.
 XX
 SC Sequence 311 AA:
 Query Match 100.0%; Score 1637; DB 21; Length 311;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 QY 1 MALRRPRLRLCARLPDFLLLLFRGCLLGAVALKSSNRTPVVQEFSEVELSCIITDSQT 60
 DB 1 malrrprrlrlcarlpdffllllfrgcllgavnlksnrtpvvqefesvelsciltsgt 60
 QY 61 SPPRIEMKKIODEQTYVFEFNKIOGDLGRAEILGKTSIKIMNVRRSALYRCFVAR 120
 DB 61 sppriemkkideqtyvffnkiogdlaagraeilgktsikimnvrirsalyrcfvar 120
 QY 121 NDRKEIDEIVIELTVQVKVTPVCRVPAKAVPVGKMATLHCQSESGHPRHYSWRNDVPL 180
 DB 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 QY 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 DB 121 ndrkeideivieltvovkvtpvcrvpakavpvgkmatlhqseeghprhyswyrndvpl 180
 QY 181 PIDSRRANPRFRNSSFHLNSETGLVFTAVHKDSCGYTCIASNDAGSARCEQEMEVYDL 240
 DB 181 pidsranprfrnssfhlhlnsetglvftavhkdsgytciasndagsarceqemeydl 240
 QY 241 NIGGIIGVLLVAVLALTTIGICAYRRGYFINNKODESYKNPKPGVNYIRTDEEG 300
 DB 241 niggiigvllvavlaalltligicayrrgyfinnkqdesyknpgkpgvnyirtdeeg 300
 QY 301 DFRHKSSFYI 310
 DB 301 dfrhksfvl 310
 RESULT 9

AAB38383
 ID AAB38383 standard; Protein; 311 AA.
 AC AAB38383;
 DT 31-JAN-2001 (first entry)
 DE Human secreted protein encoded by gene 13 clone HAPSA79.
 XX
 XX Immunosuppressive; antiarthritic; antirheumatic; antiproliferative;
 KM cytostatic; cardiant; vasotropic; cerebroprotective; neuroprotective;
 KM nootropic; antibacterial; virucide; fungicide; ophthalmological; human;
 KM vulnerable; gene therapy; infection; secreted protein.
 XX
 OS Homo sapiens.
 OS
 PN WO200061623-A1.
 PL 19-OCT-2000.
 XX
 XX 06-APR-2000; 2000WO-US08979.
 PR 09-APR-1999; 99US-0128693.
 PR 26-APR-1999; 99US-0130991.
 XX
 PA (HUMA-) HUMAN GENOME SCI INC.
 XX
 PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;
 PI Lafleur DM, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;
 PI Young PE;
 DR MPI; 2000-647418/62.
 XX
 XX New nucleic acid molecules encoding 62 human secreted proteins for
 PT diagnosing, preventing, treating or ameliorating medical conditions and
 PT used as food additives or preservatives -
 XX
 XX Claim 11; Page 642-643; 716pp; English.
 XX
 CC Sequences AAB38321-B38396 represent the amino acid sequences of 62
 CC human secreted proteins encoded by the genes AAC69512-C69587. The genes
 CC and proteins are useful for preventing, ameliorating or treating medical
 CC conditions, e.g. by protein or gene therapy. The genes are isolated from
 CC a range of human tissues disclosed in the specification. The nucleic
 CC acids, proteins, antibodies and (ant)agonists are useful in the
 CC diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.
 CC rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms
 CC of the breast or liver; (c) cardiovascular disorders e.g. cardiac
 CC arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)
 CC angiogenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)
 CC infections caused by bacteria, viruses and fungi; and (h) ocular
 CC disorders e.g. corneal infection. The polypeptides can also be used to
 CC aid wound healing and epithelial cell proliferation, to prevent skin
 CC aging due to sunburn, to maintain organs before transplantation, for
 CC supporting cell culture of primary tissues, to regenerate tissues and in
 CC chemotaxis.
 XX
 XX Sequence 311 AA:
 SO
 Query Match 100.0%; Score 1637; DB 21; Length 311;
 Best Local Similarity 100.0%; Pred. No. 1.2e-133;
 Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 QY 1 MAIRRRRLRLCARLPDFLLILFRGLICAVNLKSSNRPPVVOEFSSVELSCITTSQT 60
 DB 1 MAIRRRRLRLCARLPDFLLILFRGLICAVNLKSSNRPPVVOEFSSVELSCITTSQT 60
 QY 61 SDRIRKRIKIDQRTYVFDFNKGIDLAGRAETIGTSLKIMWTRDRLALYRCEVVAR 120
 DB 61 SDRIRKRIKIDQRTYVFDFNKGIDLAGRAETIGTSLKIMWTRDRLALYRCEVVAR 120
 QY 121 NDRKEIDVIELTVQKPYTPVCRCVPKAVPGKMATLHCQESGHPHYSMYRNDVPL 180
 DB 121 NDRKEIDVIELTVQKPYTPVCRCVPKAVPGKMATLHCQESGHPHYSMYRNDVPL 180

DB 121 NDRKEIDVIELTVQKPYTPVCRCVPKAVPGKMATLHCQESGHPHYSMYRNDVPL 180
 QY 181 PTDSRANPRFRNSFHLNSETGTLVFAVHKDDSGOYYCIASNDAGSARCEDEMEYDL 240
 DB 181 PTDSRANPRFRNSFHLNSETGTLVFAVHKDDSGOYYCIASNDAGSARCEDEMEYDL 240
 QY 241 NIGGIIGVLVLAVALITLGLICAVRGRYFINNKDGSYKPNPKPDGVNIRIDEEG 300
 DB 241 NIGGIIGVLVLAVALITLGLICAVRGRYFINNKDGSYKPNPKPDGVNIRIDEEG 300
 QY 301 DFRKSSFVI 310
 DB 301 DFRKSSFVI 310
 RESULT 10
 AAB38384
 ID AAB38384 standard; Protein; 311 AA.
 AC AAB38384;
 DT 31-JAN-2001 (first entry)
 DE Human secreted protein encoded by gene 13 clone HAPSA79.
 XX
 XX Immunosuppressive; antiarthritic; antirheumatic; antiproliferative;
 KM cytostatic; cardiant; vasotropic; cerebroprotective; neuroprotective;
 KM nootropic; antibacterial; virucide; fungicide; ophthalmological; human;
 KM vulnerable; gene therapy; infection; secreted protein.
 XX
 OS Homo sapiens.
 OS
 PN WO200061623-A1.
 PL 19-OCT-2000.
 XX
 XX 06-APR-2000; 2000WO-US08979.
 PR 09-APR-1999; 99US-0128693.
 PR 26-APR-1999; 99US-0130991.
 XX
 PA (HUMA-) HUMAN GENOME SCI INC.
 XX
 PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;
 PI Lafleur DM, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;
 PI Young PE;
 DR MPI; 2000-647418/62.
 XX
 XX New nucleic acid molecules encoding 62 human secreted proteins for
 PT diagnosing, preventing, treating or ameliorating medical conditions and
 PT used as food additives or preservatives -
 XX
 XX Claim 11; Page 643-644; 716pp; English.
 XX
 CC Sequences AAB38321-B38396 represent the amino acid sequences of 62
 CC human secreted proteins encoded by the genes AAC69512-C69587. The genes
 CC and proteins are useful for preventing, ameliorating or treating medical
 CC conditions, e.g. by protein or gene therapy. The genes are isolated from
 CC a range of human tissues disclosed in the specification. The nucleic
 CC acids, proteins, antibodies and (ant)agonists are useful in the
 CC diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.
 CC rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms
 CC of the breast or liver; (c) cardiovascular disorders e.g. cardiac
 CC arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)
 CC angiogenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)
 CC infections caused by bacteria, viruses and fungi; and (h) ocular
 CC disorders e.g. corneal infection. The polypeptides can also be used to
 CC aid wound healing and epithelial cell proliferation, to prevent skin
 CC aging due to sunburn, to maintain organs before transplantation, for
 CC supporting cell culture of primary tissues, to regenerate tissues and in
 CC chemotaxis.

XX Sequence 311 AA;

Query Match 100.0%; Score 1637; DB 21; Length 311;
Best Local Similarity 100.0%; Pred. No. 1.2e-133;
Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLRLCARLPDFELLFRGCLIGAVNLKSNRTPVQEFESVELSCITDSQT 60
DB 1 malrrprrlrlcarlpdffllllfrgcllgavnlksnrtprvgfesvelscitdsqt 60
QY 61 SDPRIEMKKIODEQTTTFYFDNKKIOGDLAGRAELIGKTSIKIWNTRDSDALYRCEVAR 120
DB 61 sdprlewkkidqetqlyffidnkigdlagraellgktsiklwntrdsalyrcevar 120
QY 121 NDRKEIDEIVIELTVQVPRVPCVPRKAVPVGKMATLHCQSEGHPRHYSWYRNDVPL 180
DB 121 ndrkeideivieltvqvpvpcvprkavpvgkmatlhcgeseqhprphyswyrndvpl 180
QY 181 PDSRANPRFRNSSFHLNSETGLVFTAVHKDSCQYCIASNDGASARCEQEMEYVDL 240
DB 181 pdsranprfrnssfhltnsetglvftavhkddsgqyciasndgsarceeqemeydl 240
QY 241 NIGGIIGVYLVAVLALITLIGICAYRRGYFINNKQDESYKPKPGVNYIRTDEEG 300
DB 241 niggiigvylvavlaalitlglccayrrgyfinnkqdesyknpgkpgvnyirtdeeg 300
QY 301 DFRHKSFPVI 310
DB 301 dfrhksfvi 310

RESULT 11

ID AAB80431 standard: peptide; 339 AA.

AC AAB80431;

DT 24-APR-2001 (first entry)

DE Gene #13 associated peptide #1.

KW Secreted protein; human; autoimmune; hyperproliferation;
cardiovascular; cerebrovascular; infection; food.

OS Homo sapiens.

XX 0200107459-A1.

PD 01-FEB-2001.

PE 10-JUL-2000; 2000WO-US19735.

PR 23-JUL-1999; 99US-0145220.

PA (HUMA-) HUMAN GENOME SCI INC.

PI Rosen CA, Ruben SM, Ehner R, Duan RD, Ni J, Soppet DR, Moore PA;
Shi Y, Lafleur DM, Olsen HS, Birse CE, Komatsoulis GA;

DR WPI; 2001-123261/13.

PT New isolated nucleic acid encoding 29 secreted proteins, for
diagnosing, preventing and treating e.g. autoimmune,
hyperproliferative, cardiovascular, and ocular diseases or disorders
and microorganism infections

PS Disclosure; Page 75; 601pp; English.

CC The present invention relates to 29 human secreted proteins. The
invention is used to prevent autoimmune diseases e.g. rheumatoid
arthritis, hyperproliferative disorders e.g. neoplasms of the

CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
cerebrovascular disorders e.g. cerebral ischemia, angiodenesis,
nervous system disorders e.g. Alzheimer's disease, infections
caused by bacteria, viruses and fungi and ocular disorders e.g.
corneal infection. Also used in food preparations.

XX Sequence 339 AA;

Query Match 100.0%; Score 1637; DB 22; Length 339;
Best Local Similarity 100.0%; Pred. No. 1.4e-133;
Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLRLCARLPDFELLFRGCLIGAVNLKSNRTPVQEFESVELSCITDSQT 60
DB 30 malrrprrlrlcarlpdffllllfrgcllgavnlksnrtprvgfesvelscitdsqt 89
QY 61 SDPRIEMKKIODEQTTTFYFDNKKIOGDLAGRAELIGKTSIKIWNTRDSDALYRCEVAR 120
DB 90 sdprlewkkidqetqlyffidnkigdlagraellgktsiklwntrdsalyrcevar 149
QY 121 NDRKEIDEIVIELTVQVPRVPCVPRKAVPVGKMATLHCQSEGHPRHYSWYRNDVPL 180
DB 150 ndrkeideivieltvqvpvpcvprkavpvgkmatlhcgeseqhprphyswyrndvpl 209
QY 181 PDSRANPRFRNSSFHLNSETGLVFTAVHKDSCQYCIASNDGASARCEQEMEYVDL 240
DB 210 pdsranprfrnssfhltnsetglvftavhkddsgqyciasndgsarceeqemeydl 269
QY 241 NIGGIIGVYLVAVLALITLIGICAYRRGYFINNKQDESYKPKPGVNYIRTDEEG 300
DB 270 niggiigvylvavlaalitlglccayrrgyfinnkqdesyknpgkpgvnyirtdeeg 329
QY 301 DFRHKSFPVI 310
DB 330 dfrhksfvi 339

RESULT 12

ID AAY96294 standard: protein; 310 AA.

AC AAY96294;

DT 16-AUG-2000 (first entry)

DE Human IGFAM-6 immunoglobulin.

KW Human; immunoglobulin; IGFAM-6; IGFAM; immune disorder; cancer;
infection; inflammation; haematopoiesis; AIDS; allergy.

OS Homo sapiens.

EH Key Location/Qualifiers

FT Peptide 1..30

FT Protein 31..310

FT Domain 46..117

FT Domain 153..221

FT Domain 238..260

FT Domain 261..260

FT Domain 261..260

FT Domain 261..260

FT Domain 261..260

FT Domain 261..260

FT Domain 261..260

FT Domain 261..260

PR 07-APR-1999; 9905-0128194.
XX
PA (INCY-) INCYTE PHARM INC.
XX
PI Yue H, Tang YF, Corley NC, Guegler KJ, Gorgone GA, Baughn MR.
XX Lu DM, Lai P, Hillman JL, Yang J;
DR WPI: 2000-387796/33.
DR N-PSDB; AAA27386.
XX
PT Immunoglobulin superfamily proteins, the agonist and antagonist of the
PT protein is useful for preventing and treating disorders associated with
PT altered levels of the protein such as cancer, immune system disorders
XX
XX
PS Claim 1; Page 82-83; 105pp; English.
XX
CC The present sequence is the human immunoglobulin superfamily protein
CC IGFA-6. Its gene was isolated from a cDNA library of leg
CC tissue. It is expressed in reproductive, nervous and
CC cardiovascular tissue, where cancer and inflammation are common. The
CC gene, protein, its antibodies, agonists and antagonists are suitable for
CC diagnosing and treating many diseases, including cancer, immune system
CC disorders (such as inflammation, AIDS, allergies, anaemia,
CC arteriosclerosis, asthma, atherosclerosis, cholecystitis, Crohn's
CC disease, diabetes mellitus, emphysema, Graves' disease, hepatitis,
CC multiple sclerosis, psoriasis, rheumatoid arthritis, scleroderma,
CC systemic lupus erythematosus and ulcerative colitis), complications of
CC cancer, haemodialysis and extracorporeal circulation, trauma and
CC haematopoietic cancer (such as leukaemia) and infections caused by
CC bacteria, viruses, fungi or parasites.
XX
XX
SQ Sequence 310 AA:
XX
Query Match 99.5%; Score 1629; DB 21; Length 310;
Best Local Similarity 99.7%; Pred. No. 6.1e-133;
Matches 309; Conservative 0; Mismatches 1; Indels 0; Gaps 0;
XX
1 MAIRRRRLRLCARLPDFELLFRGLGAVNLKSSNRPVVOEFSEVSLCTITTSQT 60
Db 1 MAIRRRRLRLCARLPDFELLFRGLGAVNLKSSNRPVVOEFSEVSLCTITTSQT 60
XX
QY 61 SDPRLEKWKIQDEQTYVFPFNKIOGLAGRAELIKTSKIMWTRRDSALYRCEVVAR 120
D 61 SDPRLEKWKIQDEQTYVFPFNKIOGLAGRAELIKTSKIMWTRRDSALYRCEVVAR 120
XX
QY 121 NDRKEIDELVIELTVQVYPVPCRPKAVPVGMATLHCQESGHPRPHSWRNDVPL 180
D 121 NDRKEIDELVIELTVQVYPVPCRPKAVPVGMATLHCQESGHPRPHSWRNDVPL 180
XX
QY 181 PTPSRANPRFRNSFHLNSETGLVFAVHKDSCGYCCASNDAGSARCEDEMEVYDL 240
Db 181 PTPSRANPRFRNSFHLNSETGLVFAVHKDSCGYCCASNDAGSARCEDEMEVYDL 240
XX
QY 241 NIGGIIGVLVLAVALITLIGICAVRRGYFTNNKODGESYKPKRDPGVNITRTDEG 300
Db 241 NIGGIIGVLVLAVALITLIGICAVRRGYFTNNKODGESYKPKRDPGVNITRTDEG 300
XX
QY 301 DFRKSSFV 310
Db 301 DFRKSSFV 310
XX
DE Human secreted protein sequence encoded by gene 15 SEQ ID NO:134.

XX
KW Human; secreted protein; immunosuppressive; antiarthritic; antirheumatic;
KW antiproliferative; cytoskeletal; cardiant; vasotropic; cerebroprotective;
KW neutrophic; neuroprotective; antibacterial; virucide; fungicide; neoplasm;
KW ophthalmological; autoimmune disease; rheumatoid arthritis; angioneuromatosis;
KW hyperproliferative disorder; cardiovascular disorder; infection;
KW cerebrovascular disorder; nervous system disorder; ocular disorder;
KW wound healing; chemotaxis.
XX
OS Homo sapiens.
XX
PN W0200056754-A1.
XX
PD 28-SEP-2000.
XX
PF 16-MAR-2000; 2000MO-US06792.
XX
PR 19-MAR-1999; 9905-0125362.
PR 10-DEC-1999; 9905-0169980.
XX
PA (HUMA-) HUMAN GENOME SCI INC.
XX
PI Rosen GA, Ruben SM, Komatsu G;
XX WPI: 2000-579483/54.
XX N-PSDB; AAC74237.
XX
PT Isolated nucleic acid molecule encoding a human secreted protein is
PT used in preventing, treating or ameliorating a medical condition -
XX
XX
PS Disclosure; Page 32; 434pp; English.
XX
CC The polynucleotide sequences given in AAC74223-C74279 encode the human
CC secreted proteins represented in AAB39179-B39226. Sequences
CC AAB39227-B39308 are alternative proteins encoded by the genes, and also
CC protein sequences with which they share homology. The proteins have
CC activities based on the tissues and cells in which they are expressed.
CC Examples of activities include: immunosuppressive; antiarthritic;
CC antirheumatic; antiproliferative; cytoskeletal; cardiant; vasotropic;
CC cerebroprotective; neuroprotective; antibacterial; virucide;
CC fungicide; and ophthalmological. The human secreted proteins,
CC polynucleotides, antagonists and agonists of the invention may be useful
CC in the treatment, prevention, and/or diagnosis of various disease,
CC disorders and conditions such as autoimmune diseases e.g. rheumatoid
CC arthritis, hyperproliferative disorders e.g. neoplasms of the breast or
CC liver, cardiovascular disorders e.g. cardiac arrest, cerebrovascular
CC disorders e.g. cerebral ischemia, angiogenesis, nervous system disorders
CC e.g. Alzheimer's disease, infections caused by bacteria, viruses and
CC fungi and ocular disorders e.g. corneal infection. The polypeptides can
CC also be used to aid wound healing and epithelial cell proliferation, to
CC regenerate tissues, maintain organs before transplantation, in
CC chemotaxis and as a food additive or preservative e.g. to increase
CC storage capabilities. Sequences AAC74214-C74222 and AAB39178 are used
CC during the isolation and characterisation of the genes of the invention.
XX
XX
SQ Sequence 285 AA:
XX
Query Match 91.5%; Score 1498; DB 21; Length 285;
Best Local Similarity 99.3%; Pred. No. 1.1e-121;
Matches 283; Conservative 0; Mismatches 2; Indels 0; Gaps 0;
XX
QY 26 GCLIGAVNLKSSNRPVVOEFSEVSLCTITTSQTSPIEMKRIODEQTYVFPFNKIQ 85
Db 26 GCLIGAVNLKSSNRPVVOEFSEVSLCTITTSQTSPIEMKRIODEQTYVFPFNKIQ 85
XX
QY 86 GDLAGRAELIKTSKIMWTRRDSALYRCEVVARNDKREIDELVIELTVQVYPVPCRP 145
Db 86 GDLAGRAELIKTSKIMWTRRDSALYRCEVVARNDKREIDELVIELTVQVYPVPCRP 145
XX
QY 146 VPKAVPVGMATLHCQESGHPRPHSWRNDVPLPTPSRANPRFRNSFHLNSETGLV 205
Db 146 VPKAVPVGMATLHCQESGHPRPHSWRNDVPLPTPSRANPRFRNSFHLNSETGLV 205
XX
DE 121 VPKAVPVGMATLHCQESGHPRPHSWRNDVPLPTPSRANPRFRNSFHLNSETGLV 180

Qy	Dy
206	206
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986	986
991	991
996	996
1001	1001
1006	1006
1011	1011

RESULT 14

ID AAB27272 standard; Protein; 310 AA.
 XX
 AC AAB27272;
 XX
 DT 23-FEB-2001 (first entry)
 XX
 DE Human confluency regulated adhesion molecule 1 #1.
 XX
 KW Immunoglobulin superfamily; Ig Sf; vascular adhesion molecule;
 KW Inflammation; cancer; wound; angiogenesis; human;
 KW Confluency regulated adhesion molecule 1; CRAM-1; JAM-2.
 XX
 OS Homo sapiens.
 XX
 PN WO200053749-A2.
 XX
 PD 14-SEP-2000.
 XX
 PF 13-MAR-2000; 2000WO-EP02219.
 XX
 PR 11-MAR-1999; 99EP-0200746.
 XX
 PA (RMFD-) RMF DICTAGENE SA.
 XX
 PI Imhof BA, Aurand-Lions M;
 DR WPI; 2000-587436/55.
 XX
 PT Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or
 PT CRAM-2) polypeptide, useful for treatment of tumors, inflammation
 PT reactions and modulating vascular permeability -
 XX
 PS Claim 1; Fig 3; 59pp; English.
 XX
 CC The present sequence is the human confluency regulated adhesion molecule
 CC (CRAM-1, also known as JAM-2). CRAM-1 is one of the vascular adhesion
 CC proteins of the immunoglobulin superfamily (Ig Sf). The CRAM-1 protein
 CC and coding sequence can be used in the treatment of cancer,
 CC inflammation, to modulate cell-cell interactions and angiogenesis, and
 CC in the modulation of wound healing.
 XX
 SQ Sequence 310 AA;

Query Match	86.1%	Score 1409	DB 21	Length 310
Best Local Similarity	85.8%	Prod. No. 6.3e-114		
Matches 266	Conservative 18	Missed Matches 26	Indels 0	Gaps 0
QY	1	MALRRPRRLRCARLDPDFLLLLFRGCLLGANLKSNNRPVVOEFEEVELSCIIINDSOT	60	
Db	1	malrrrlrlrlrlaripfflllllllfrgcmleavnlksnnrpvrhfeesvelscilthsgt	60	
QY	61	SDPRLEMMKIQDEQTYTFEFDNKIQGDLAAGRAELCKTSLKLTWNTYTRBSALRYCEVAR	120	
Db	61	sdprlewmkiiqdgqcttyyfdnkilqgdlagrtcdvtrktsrltmvnytrdsalrycevarl	120	
QY	121	NDRKEIDVIELVLTQVCPVTPVCGRPKPAVPGKMATTLCOESEGPRPHYSMYRNDVPL	180	
Db	121	ndrkevdetlletlvqvpvrpvcrlpraavprygtcatclqgeseegyprrhyswyndvpl	180	
QY	181	PTDSFANPRFRNSFHLNSETGLVFTVAVHKVDGSGQGYCIASNDGASARCEQEMEVYDL	240	

Db 181 ptdsarprfrfnssfhvnsetgclvfnahvkhdsqgylacisndagaregqdmeydl 240

Qy 241 NIGGIGCVLVVLAVALITLGTICCAIRRGFFLNKODGESYKNPKGAPDQVNTIRIDEEG 300

Db 241 nlaqilgvlvllvllavltmglocayrrgcflaskqdsqsykspgkhdvnylrtseeg 300

Qy 301 DERRHSSFVI 310

Db 301 dfrhksfvi 310

RESULT 15

xx	AMB27278 standard; Protein; 310 AA.
xx	
AC	AAB27278;
xx	
DT	23-FEB-2001 (first entry)
xx	
DE	Murine confluency regulated adhesion molecule 1.
xx	
RW	Immunoglobulin superfamily; Ig Sf; vascular adhesion molecule;
RW	inflammation; cancer; wound; angiogenesis; mouse;
RW	confluency regulated adhesion molecule 1; CRAM-1; JAM-2.
xx	
OS	Mus sp.
xx	
PN	WO200053749-A2.
xx	
PD	14-SEP-2000.
xx	
PE	13-MAR-2000; 2000WO-EP02219.
xx	
PR	11-MAR-1999; 99EP-0200746.
xx	
PA	(RMFD-) RMF DICTAGENE SA.
xx	
PI	Imhof BA, Aurrand-Llions M;
xx	
DR	WPI: 2000-567436/55.
xx	
DR	N-PSDB: AAA97189.
xx	
PT	Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or
PT	CRAM-2) polypeptide, useful for treatment of tumors, inflammation
PT	reactions and modulating vascular permeability -
xx	
PS	Example; Fig 8; 59pp; English.
xx	
CC	The present sequence is the murine confluency regulated adhesion molecule
CC	1 (CRAM-1, also known as JAM-2). CRAM-1 is one of the vascular adhesion
CC	proteins of the immunoglobulin superfamily (Ig Sf). The CRAM-1 protein
CC	and coding sequence can be used in the treatment of cancer, inflammation,
CC	to modulate cell-cell interactions and angiogenesis, and in the
CC	modulation of wound healing.
xx	
SO	Sequence 310 AA;

	Query Match	86.1%;	Score 1409;	DB 21;	length 310;
	Best Local Similarity	85.8%;	Pred. No. 6,3e-114;		
	Matches	266;	Conservative 18;	Mismatches 26;	Indels 0; Gaps 0.
QY	1 MALRRPRRLCARLPDPFLLLFPGCLLGAVNKKSSNRTPVQEFESVELSCITTDSDT	60			
Db	1 malsrrlrirlyariphtflilllfrgcmiaevankssnnpvhefesyvelscilthsqc	60			
QY	61 SPPRIEMKKIQDEQTYTVFFDNKIQGDLAAGRAELICLTKSLAKWNTTRRSALRYCEVVAR	120			
	:				
Db	61 sdprlewkkigqgttyvyfdnkisgdagrcdvdvgktsrlmwrvrsdsalryceval	120			
QY	121 NDRKETDELVEILTVQVKRVTPVCARPKAPVPGRKNATLHCQSEGGPRPHYSMYRNDVPL	180			

Db 121 ndrkedeltielivqvkptvpcrlpaavpygkatalqcesesgyprphyswyrndvpl 180
QY 181 PTDSRANPRFRNSSFHLNSEFTGLVFTAVHRKDSGOYYCIAINDAGSARCEOEEMEYIDL 240
Db 181 ptdsranprfqnsfhnsetglvfnavhkddsgqyyciasndagaarceqgdmeydl 240
QY 241 NIGGIIGVLYVAVLALITLGICCAVRRGYFINNKODGESYKPNPKGPDGVTNIRTDDEG 300
Db 241 nlagliqyvlvllvavltmglcayrrgcflsskqdgesykpgkhdgvnyiltseeg 300
QY 301 DFRKSSFYI 310
Db 301 dfthksfvl 310

Search completed: August 6, 2001, 09:33:06
Job time: 217 sec

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Db 61 sdprlwkakqdggtcyvufdnklgddlagrcdrvgktsalrlmwtstsdslaycveval 120
YQ 121 NDRKEIDVIELTVOKVPTRVCRAVKAVRNGKMATLHCQESECHPRPHYSWRNDVPL 180
Db 121 ndrkevdeltelivgvkrptpcrtpaarvygkalqlcqesegyprrphyswyndvpd 180
OY 181 PTOSRAPRRRNRSFHLNSETGTLVTAAHKDSDSOYCICASNDAGSARCEDEMEVDL 240
Db 181 pldtanrpfrqmssflvnsetctglvtlnavhkdsdqyyciasndaagaarcegdmevdl 240
OY 241 NIGGIIGVLVAIVLATLTGLGCAYRGGYFLINKKOGESEYKNPKRDGVNYIIRTDSEG 300
Db 241 niagilggvlvaivlatltgmjccayrtgcflisskdqgesykspgknodyniltseeg 300
OY 301 DFRHKSFEVI 310
Db 301 dfrhksfevi 310
RES 7 AAM85457 standard; Protein; 298 AA.
AA 16
XX AAM85457:
AC AAM85457:
DT 25-FEB-1999 (first entry)
XX Secreted protein encoded by clone ct664_4.
DE Secreted protein; nutritional activity; immune stimulating; vaccine;
KW Suppressing activity; haematopoiesis regulating activity;
KM tissue growth activity; activin; inhibin activity; chemotaxis;
KM chemokineic activity; haemostasis; thrombolytic activity; receptor;
KW ligand; anti-inflammatory; cadherin; tumour invasion suppressor;
KM tumour inhibition; gene therapy.

XX Homo sapiens.
OS MO9842739-AZ.
PN PD
PD 01-OCT-1998.
XX XX
PF 20-MAR-1998; 98MO-US05653.
XX PR
PR 19-MAR-1998; 98US-0044466.
PR 21-MAR-1997; 97US-0822167.
PA GENETICS INST INC.
PI Agostino MJ, Jacobs K, Lavallie ER, McCoy JM, Merberg D;
PI Racile LA, Spaulding V, Treacy M;
PI WPI; 1998-609890/51.
DR N-PDB; AAB82780.
XX DR
XX XX
XX CC

Claim 17, Page 73-74; 113pp; English.

The present sequence represents a secreted protein. The polynucleotide and secreted protein are predicted to have biological activities which would make them suitable for treating, preventing or ameliorating medical conditions in humans and animals, although no supporting data is given. Suggested activities include nutritional activity, immune stimulating (e.g. as vaccines) or suppressing activity, haematopoiesis regulating activity, tissue growth activity, activin/inhibin activity, chemotactic/chemokinetic activity, hemostatic and thrombolytic activity, receptor/ligand activity, anti-inflammatory activity, cadherin/tumour invasion suppressor activity, and tumour inhibition activity (no data is given in the specification to support these activities). The

CC	polynucleotide is also stated to be useful for gene therapy.
XX	
SQ	Sequence 298 AA:
	Query Match 29.8%, Score 488; DB 19; Length 298;
	Best Local Similarity 36.2%; Pred. No. 2,4e-34;
	Matches 115; Conservative 60; Mismatches 115; Indels 28; Gaps 10;
OY	1 MALRRPRLRICARLPDFELLFRGCLIG-----AVNLKSSNRPVVO--EFESVELSC 53
DB	1 marshrhl-----lllrllylvaglyhkaygfsapkdqdvqlaveygeallac 50
OY	54 IITDSQTSDPREMKKIODEOTTFFFPDNKTIOGLAGRAELIGRTSEKIMNTTRDSALX 113
DB	51 -ktpkkktvsrlewkl-grsvsfvyqqcltggdfknfneam-dfnlrtnvtrsdagky 107
OY	114 RCEVVARBRD-KEIDEIYEILTVQKPPTPVCRVPRAKAPVCGMATLHCOESEGHPRPHYS 172
DB	108 rcevassegqgnleedvtleviyavapscvepsaslsqtlvelrcgdkgenpapeyt 167
OY	173 WYRNDVPPTPSRANPRFNSSFHLNSEGTGLVTFAVHKHDSGOYYCIASNDAGSARCEE 232
DB	168 wtkdgrlrlenprlgsgstnsysntmktgtltgfvtsekldtgeyscearnsvgyrrcpq 227
OY	223 QEMEVEDINIGGIIGCVLVLAVALTLTGICCAVRKGFTLNKKODGESYKNPKGPDDGVN 292
DB	228 kmgyddlnisgliaavvalvisvcgylgvcyagrkyf-ske--tsfq--ksnss 280
OY	293 YIRTEDEGDGRHKSSFVI 310
DB	281 kalmsemdfkhtksfil 298
	RESULT 17
ID	AU000512 standard; Protein: 298 AA.
XX	
AC	AU000512;
XX	
DT	09-MAY-2001 (first entry)
XX	
DE	Human junctional adhesion protein (JAM2).
XX	
KW	Junctional adhesion protein; JAM2; cellular localisation;
KW	cellular expression: immunoprecipitation; stroke; phosphorylation;
KW	glycosylation; paracellular migration;; inflammatory disease; "
KW	arthritis; asthma; rheumatoid arthritis; inflammatory bowel disease;
Crohn's disease.	
XX	
OS	Homo sapiens.
XX	
FH	Key
FT	Peptide location/Qualifiers
FT	1..20 1..20
FT	/note= "Possible signal peptide #1"
FT	Peptide 1..28
FT	/note= "Possible signal peptide #2"
FT	Protein 21..298
FT	/note= "Possible mature JAM2 #1"
FT	Protein 29..298
FT	/note= "Possible mature JAM2 #2"
FT	Domain 237..254
FT	/note= "Transmembrane domain"
XX	
PN	WO200114404-A1.
XX	
PD	01-MAR-2001.
XX	
PF	23-AUG-2000; 2000WO-US23158.
XX	
PR	24-AUG-1999; 99US-0150459.
XX	
PA	(TEXA-) TEXAS BIOTECHNOLOGY CORP.

PT New isolated nucleic acid for producing a PRO polypeptide, analyzing
 PT genetic disorders and treating cardiovascular, endothelial or
 PT angiogenic disorders, such as atherosclerosis, wounds or cancer -
 PS Claim 69; Fig 36; 293pp; English.

CC The invention relates to novel human angiogenesis-associated proteins
 CC designated PRO proteins (AA053064-B53097), and to nucleic acids encoding
 CC PRO proteins. The invention also relates to vectors and host cells
 CC comprising a PRO nucleic acid, the recombinant production of a PRO
 CC protein, PRO antibodies specific for a PRO protein, fusion proteins
 CC comprising a PRO protein, agonists or antagonists of a PRO protein, and
 CC compounds which inhibit the expression of a PRO gene. The invention
 CC additionally encompasses methods of identifying modulators of PRO
 CC expression or activity; diagnosing a cardiovascular, endothelial or
 CC angiogenic disorder, or a susceptibility to such a disorder by detecting
 CC mutations in a PRO gene, or the expression level of a PRO gene within a
 CC particular tissue; treating a cardiovascular, endothelial or angiogenic
 CC disorder via the administration of a PRO protein, PRO nucleic acid, or
 CC PRO agonist or antagonist; a retroviral gene therapy vector comprising a
 CC PRO nucleic acid; and methods of inhibiting or stimulating endothelial
 CC cell growth, cardiac hypertrophy or PRO-induced angiogenesis via the
 CC administration of a PRO protein, or an agonist or antagonist thereof.
 CC PRO nucleic acids, PRO proteins, antibodies against PRO proteins, PRO
 CC agonists and PRO antagonists may be used as therapeutic agents to treat
 CC cardiovascular, endothelial or angiogenic disorders, such as
 CC atherosclerosis, osteoporosis, myocardial infarction, hypertension,
 CC diabetic retinopathy, rheumatoid arthritis, Crohn's disease, psoriasis,
 CC endometriosis, ulcers, wounds, cancer, Alzheimer's disease, Huntington's
 CC disease, or stroke. PRO nucleic acids are additionally useful in the
 CC recombinant production of PRO proteins, as hybridisation probes to
 CC screen libraries to isolate cDNAs with sequence identity to PRO proteins,
 CC to map genes encoding PRO proteins, to analyse genetic disorders, and in
 CC gene therapy. PRO nucleic acids can also be used to produce transgenic
 CC animals useful for the development and screening of potential
 CC therapeutic agents. The present sequence represents a PRO protein of the
 CC invention.

CC Sequence 312 AA:

Query Match 28.2%; Score 461.5; DB 22; Length 312;
 Best Local Similarity 37.1%; Pred. No. 5e-32;

Matches 104; Conservative 52; Mismatches 103; Indels 21; Gaps 7;

QY 1 MALRRPRLRLCARLPDFLLFLFRGCLG----AVNLKSNRRPVPVQ--EFESVELSC 53
 DB 1 mairstrhrf-----lillllylvalyghkaygsapdkqgvaveygeaillac 50
 QY 54 ITTDSOTSDPRIEMKKIODEQTYVFFDNKIOGDLGRAEILGKTSLSKTMWYTRDSALY 113
 DB 51 -ktpkktvsrlewkkl-grsvsfvygqqligddfnkremi-dfritrkntvrsdagky 107
 QY 114 KCEVVARNDK-KEIDEIVIELTVQVKPVTPVCGRPKAPVGVKMATLHCQSESGHPRPHYS 172
 DB 108 rcevsapsegqnlseelvtclvlpavpsecpesaisglvlelrcqdgknpepyt 167
 QY 173 WRBNQVPLPTDSRANPRFNSSPHLNSERTGLVFTAVHDDSGOYCIASNDGSRCEE 232
 DB 168 wtkdgrtllleprlsgqsnssytmctkgtlqfntvsldtgeyscearnsvytrcpq 227
 QY 233 QEMEYVDNLIGGIIGVLVAVLALITLIGICAVRGYF 272
 DB 228 krmgyvdnlisglilaavvalvsvcgvgcyagqkyf 267

RESULT 29

AAV11472
 ID AAV11472 standard; Protein: 89 AA.
 AC AAV11472;
 XX
 DT 21-JUN-1999 (first entry)

XX Human 5' EST secreted protein SEQ ID No 294;
 DE Human; secreted protein; EST; expressed sequence tag; diagnosis;
 XX forensic; gene therapy; chromosome mapping; signal peptide;
 KW upstream regulatory sequence; cytokine activity; cell proliferation;
 KW differentiation; haematopoiesis; regulation; tissue growth regulation;
 KW reproductive hormone regulation; chemotactic; chemokine; haemostatic;
 KW thrombolytic; anti-inflammatory; tumour inhibition.

OS Homo sapiens.

PN W0906551-A2.

PD 11-FEB-1999.

PF 31-JUL-1998; 98MO-1B01235.

PR 01-AUG-1997; 97US-0905133.

PA (GEST) GENSET.

PI Duclert A, Dumas Mline Edwards J, Lacroix B;

DR WPI; 1999-153781/13.

DR N-PSDB; AAX39538.

PT New nucleic acids encoding human secreted - proteins obtained from
 PT cDNA libraries prepared from substantia nigra, cerebellum, surrenals
 PT and fetal brain tissue

PS Claim 34; Page 394; 434pp; English.

CC AAX39440 to AAX39597 represent 5' expressed sequence tags (ESTs) for
 CC human secreted proteins, and encode the proteins given in AAY11374 to
 CC AAY11531, respectively. The proteins given represent the signal peptide
 CC and an N-terminal fragment of a secreted protein. The nucleic acid
 CC sequences can be used for producing secreted human gene products. They
 CC can also be used to develop products for diagnosis and therapy. The
 CC proteins obtained may have cytokine activity, cell
 CC proliferation/differentiation activity, haematopoiesis regulating
 CC activity, tissue growth regulating activity, reproductive hormone
 CC regulatory activity, chemotactic/chemokine activity, haemostatic and
 CC thrombolytic activity, receptor/ligand activity, anti-inflammatory
 CC activity, tumour inhibition activity or other activities. The products
 CC can be used in forensic, gene therapy and chromosome mapping procedures.
 CC The sequences can also be used for obtaining corresponding promoter
 CC sequences. The nucleic acids encoding the signal peptide can be used for
 CC directing extracellular secretion of a polypeptide or the insertion of a
 CC polypeptide into a membrane, or importing a polypeptide into a cell.

CC Sequence 89 AA:

Query Match 28.1%; Score 460; DB 20; Length 89;
 Best Local Similarity 100.0%; Pred. No. 1.3e-32;
 Matches 89; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 MALRRPRLRLCARLPDFLLFLFRGCLGAVNLKSNRRPVPVQEFESVELSCITTSOT 60
 DB 1 malrrprlrlcarlpdflilllfrgcllgavnlksnrrtpvvgcfesvelscilttsqt 60
 QY 61 SDPRIEMKKIODEQTYVFFDNKIOGDLA 89
 DB 61 sdprlewkkiqdeglttyvfndkikgdlia 89

RESULT 30

AAW61380
 ID AAW61380 standard; Protein: 300 AA.
 AC AAW61380;
 XX
 DT

XX 24-APR-2001 (first entry)
 DT
 XX
 DE Human PRO245 protein.
 KW Human: PRO: dermatological; antipsoriatic; cytostatic; antiinflammatory;
 KM antiparkinsonian nootropic; neuroprotective; vulnerary; cardiant;
 KM antiangiogenic; vasotropic; antiasthmatic; antirheumatic; cancer;
 KM antiarthritic; antifertility; antidiabetic; antiviral; diabetes;
 KM ophthalmological; gene therapy; skin disease; gastrointestinal disorder;
 KM ischaemia; inflammation.
 XX
 OS Homo sapiens.
 PN WO200104311-A1.
 PD
 XX 18-JAN-2001.
 PF 22-FEB-2000; 2000MO-US04414.
 XX
 XX JUL-1999; 99US-0143048.
 PR JUL-1999; 99US-0145698.
 PR 28-JUL-1999; 99US-0146222.
 PR 08-SEP-1999; 99MO-US20594.
 PR 13-SEP-1999; 99MO-US20944.
 PR 15-SEP-1999; 99MO-US21090.
 PR 15-SEP-1999; 99MO-US21547.
 PR 05-OCT-1999; 99MO-US23089.
 PR 29-NOV-1999; 99MO-US28214.
 PR 30-NOV-1999; 99MO-US28313.
 PR 16-DEC-1999; 99MO-US30095.
 PR 20-DEC-1999; 99MO-US30911.
 PR 20-DEC-1999; 99MO-US30999.
 PR 05-JAN-2000; 99MO-US00219.
 XX
 PA (GETH) GENENTECH INC.
 XX
 PI Ashkenazi AJ, Botstein D, Desnoyers L, Eaton DL, Ferrara N;
 PI Filvaroff E, Fong S, Gao W, Gerber H, Gerritsen ME, Goddard A;
 PI Godowski PJ, Grimaldi CJ, Gurney AL, Hillan KJ, Kijavita IO;
 PI Mather JP, Pan J, Paoni NF, Roy MA, Stewart TA, Tumas D;
 PI Williams PM, Wood WI;
 XX
 DR WPI: 2001-081051/09.
 DR N-PSDB: AAF72383.
 XX
 PT Sixty one nucleic acids encoding PRO polypeptides which are useful in
 PT the treatment of skin diseases (e.g. psoriasis), cancers (e.g. lung
 PT squamous cell carcinoma) and neurodegenerative diseases (e.g.
 PT Alzheimer's disease) -
 XX
 PS Claim 1, Fig 24; 393pp; English.
 XX
 CC The present sequence is one of sixty one novel secreted and
 CC transmembrane PRO polypeptides. The PRO polypeptides are
 CC useful for treating skin diseases (e.g. psoriasis), cancers (e.g. lung
 CC squamous cell carcinoma), gastrointestinal disorders (e.g.
 CC enterocolitis), neurodegenerative diseases (e.g. Alzheimer's disease,
 CC Parkinson's disease), wound repair, cardiovascular disorders (e.g.
 CC endometrial bleeding angiogenesis, ischaemias such as coronary
 CC ischaemia, atherosclerosis), inflammatory disorders (e.g. asthma,
 CC rheumatoid arthritis, multiple sclerosis), infertility, AIDS and
 CC diabetes and retinal disorders such as retinitis pigmentosa.
 CC The PRO nucleic acids have applications in molecular biology, including
 CC use as hybridization probes, and in chromosome and gene mapping.
 CC
 XX Sequence 312 AA:

QY 1 MALRRPRLRLCARLPDFLLFRGLIG-----AVNKKSSNRFPVQ--EFESVELSC 53
 DB 1 marterhrl-----lllllrylvalgyhkyagfispkdxqgvvlatveygaallac 50
 QY 54 ITTDSQTSDPRIEMKKIODEQTVVFPDNKIOGDIAGRDELIGKTSKIMVTRDSALY 113
 DB 51 -tkpkrkvsrlwkkf-grsvsfyygqlqgdfknraemi-dfnitknvtrsdagky 107
 QY 114 RCEVAVANR-KEIDEIVIELVQVKPVPVCRVPRKAVVGVGMATLHGOESGHPRPYS 172
 DB 108 rcevaspsegqgnleedvllvlelvapavpscevpssalsgtvlelrcqdkgnpapeyt 167
 QY 173 WYRNDVPLPTDSRAMPFRFNSSFHLNSETGLVFTVAHKKDSGOYCIASNDAGSARCEE 232
 DB 168 wfkdgirllienprlsgsqsnssytmktqglntvskldtgeyscearnsvgyrrpog 227
 QY 233 QEMEVYDLNIGGILGCVLVVLAVALITLGICAVRGIE 272
 DB 228 krmqvddlnlsgllaaavvvalvsvcglygcayqkgyf 267
 RESULT 28
 AAB53081
 ID AAB53081 standard; Protein; 312 AA.
 XX
 AC AAB53081;
 XX
 DT 28-FEB-2001 (first entry)
 XX
 DE Human angiogenesis-associated protein PRO245, SEQ ID NO:91.
 XX
 KW Human; angiogenesis-associated protein; PRO: endothelial cell growth;
 KW cardiac hypertrophy; cardiovascular disorder; osteoporosis; hypertension;
 KW angiogenic disorder; atherosclerosis; osteoporosis; hypertension;
 KW myocardial infarction; diabetic retinopathy; rheumatoid arthritis;
 KW Crohn's disease; psoriasis; endometrial disease; ulcer; wound healing; cancer;
 KW Alzheimer's disease; Huntington's disease; stroke; drug screening;
 KW gene therapy; transgenic animal.
 XX
 OS Homo sapiens.
 XX
 PN WO200053753-A2.
 XX
 PD 14-SEP-2000.
 XX
 PF 05-JAN-2000; 2000MO-US00219.
 XX
 PR 08-MAR-1999; 99MO-US05028.
 PR 12-MAR-1999; 99US-0123957.
 PR 14-MAY-1999; 99US-0134287.
 PR 02-JUN-1999; 99MO-US12252.
 PR 23-JUN-1999; 99US-0141037.
 PR 20-JUL-1999; 99US-0144758.
 PR 26-JUL-1999; 99US-0145698.
 PR 01-SEP-1999; 99MO-US20111.
 PR 08-SEP-1999; 99MO-US20594.
 PR 15-SEP-1999; 99MO-US21090.
 PR 15-SEP-1999; 99MO-US21547.
 PR 05-OCT-1999; 99MO-US23089.
 PR 30-NOV-1999; 99MO-US28313.
 PR 30-NOV-1999; 99MO-US28409.
 PR 02-DEC-1999; 99MO-US28564.
 PR 02-DEC-1999; 99MO-US28565.
 XX
 PA (GETH) GENENTECH INC.
 XX
 PI Ashkenazi AJ, Baker KP, Ferrara N, Gerber H, Goddard A;
 PI Godowski PJ, Gurney AL, Hillan KJ, Kuo SS, Mark MR, Marsters SA;
 PI Paoni NF, Pitti RM, Watanabe CK, Williams PM, Wood WI;
 XX
 DR WPI: 2001-090793/10.
 DR N-PSDB: AAC97437.
 XX

Query Match 28.2%; Score 461.5; DB 22; Length 312;
 Best local Similarity 37.1%; Pred. No. 5e-32;
 Matches 104; Conservative 52; Mismatches 103; Indels 21; Gaps 7;

SEQUENCE 298 AA; 33207 MW; CA78EE

Query Match	29.8%;	Score	488;	DB	1;	Length	298;
Best Local Similarity	36.2%;	Pred.	NO.1.4e-34;				
Matches	115;	Conservative	60;	Mismatches	115;	Indels	28;
Gaps	10;						

QY	1	MALLRPPRLRLCARLPDFFLLLRGLGCLIG----	AVNLKSSNRTPVVQ--EPESVELSC	53
DB	1	MARRSRHL-----L	LLLLRVLVVALGYHKAQFSAPRQDVVAVEQEAILAC	50
QY	54	IITDSOTSDPRIBWKIKDQOTTYVFDNKIQDGLAGRAEILGKTSIKINVTNRDSALY	113	
DB	51	-KTPPKTYSRLEWKIL-GRSVSFVYQOTLOGDFKNRAEMI-DFNIRIKNVTNRSDAGKY	107	
QY	114	RCBVARNRDD-KEIDEIVIELTVQVKEPVTVCVRPKAVPVKMATLHCQSEGHPRPHYS	172	
DB	108	RCBVSAPSEGOQNLDEEDTVLEVLVAVPVSCEVPSSALSGTVVVELRCQKEGNPAPEYT	167	
QY	173	WYRNDVPLPTDSRANPRFRNSFHLNSETGLTVFTAVHKDDSGOYYCIASNDAGSARCEE	232	
DB	168	WPKDGIRLLENPRLGSGSTSYMTMTKTLCTLOFTVSKLDTGEYSCEARNSVGYRRCPG	227	
QY	233	QMEVYDLNIGGIIGVVLVAVLALITIGICACAYRGYFINNKQDGESYKNPKPGVGN	292	
DB	228	KRMQVDNLNLSGIIAAVVVVVALVISVGLGVCYAKRKGYP--SKE--TSFQ---	KSNSSS 280	
QY	293	YIRTEEGDPRHKSSFVI	310	
DB	281	KATMSSENDEKHTKSFII	298	

RESULT	2
JAM1_MOUSE	
AC	JAM1_MOUSE
ID	Q88792;
AD	STANDARD;
DT	PRT;
DT	300 AA.
DT	01-OCT-2000 (Rel. 40, Created)
DT	01-OCT-2000 (Rel. 40, Last sequence update)
DT	01-OCT-2000 (Rel. 40, Last annotation update)
DE	JUNCTIONAL ADHESION MOLECULE PRECURSOR (JAM).
GN	JCAM OR JAM1.
OS	Mus musculus (Mouse).
OC	Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC	Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
ON	NCBI_TaxId=10090;
OX	[1]
RX	SEQUENCE FROM N.A.
RX	MEDLINE=98327120; PubMed=9660867;
RA	Martin-Padura I., Lostaglio S., Schneemann M., Williams L., Romano M.,
RA	Fruscella P., Panzeri C., Stoppacciaro A., Ruco L., Villa A.,
RA	Simmons D., Dejana E.;
RT	"Junctional adhesion molecule, a novel member of the immunoglobulin
RT	superfamily that distributes at intercellular junctions and modulates
RT	monocyte transmigration."
RL	J. Cell Biol. 142:117-127(1998).
CC	-!- FUNCTION: PLAYS A ROLE IN REGULATING MONOCYTE TRANSMIGRATION
CC	INVOLVED IN INTEGRITY OF EPITHELIAL BARRIER. INVOLVED IN PLATELET
CC	ACTIVATION.
CC	-!- SUBCELLULAR LOCATION: TYPE I MEMBRANE PROTEIN (POTENTIAL).
CC	-!- TISSUE SPECIFICITY: LOCALIZED AT TIGHT JUNCTIONS OF BOTH
CC	EPITHELIAL AND ENDOTHELIAL CELLS.
CC	-!- SIMILARITY: CONTAINS 2 IMMUNOGLOBULIN-LIKE V-TYPE DOMAINS.
CC	-----
CC	This SWISS-PROT entry is copyright. It is produced through a collaboration
CC	between the Swiss Institute of Bioinformatics and the EMBL outstation -
CC	the European Bioinformatics Institute. There are no restrictions on its
CC	use by non-profit institutions as long as its content is in no way
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CC	entities requires a license agreement (See http://www.isb-sib.ch/announce/)
CC	or send an email to license@isb-sib.ch).
CC	-----
DR	EMBL; U089915; AAC32982.1; -
DR	MGD; MGI:1321398; Jcam.
DR	Inet-Pro; IPR003006; .


```
Db 191 PTDGRANPRFQNSFHVNSRTGTLVFNVAHKDDSGQYVCIASNDAGAACRCQDMVEYDL 240
Qy 241 NIGGIIGVVLAVLALITIGICCAVRRGYFINNKDGESYKPKGPDGVNYIRTDDEG 300
Db 241 NIAGIIGVVLVLLVAVITWIGICCAVRRGCFISSKQDGESYKSPGKHGVDGVNYIRTSSE 300
Qy 301 DFRHKSSEFVI 310
Db 301 DFRHKSSEFVI 310

RESULT 2
Q9JH159 PRELIMINARY; PRT; 298 AA.
AC Q9JH159;
DT 01-OCT-2000 (TReMBLrel. 15, Created)
DT 01-OCT-2000 (TReMBLrel. 15, Last sequence update)
DT 01-MAR-2001 (TReMBLrel. 16, Last annotation update)
DE VASCULAR ENDOTHELIAL JUNCTION-ASSOCIATED MOLECULE (JUNCTIONAL ADHESION MOLECULE-3).
DE JAM-3.
OS Mus musculus (Mouse).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
OX NCBI_TaxID=10090;
RN [1]
RP SEQUENCE FROM N.A.
RC STRAIN=C57BL/6J;
RX MEDLINE=20317114; PubMed=10779521;
RA Palmeri D., van Zante A., Huang C.-C., Hemmerich S., Rosen S.D.;
RT "Vascular Endothelial Junction-associated Molecule, a Novel Member of
RT the Immunoglobulin Superfamily, Is Localized to Intercellular
RT Boundaries of Endothelial Cells."
RL J. Biol. Chem. 275:19139-19145(2000).
RN [2]
RP SEQUENCE FROM N.A.
RX PubMed=11036763;
RA Aurand-Lions M.A., Duncan L., Du Pasquier L., Imhof B.A.;
RT "Cloning of JAM-2 and JAM-3: an Emerging Junctional Adhesion Molecular
RT Family?"
RL Curr. Top. Microbiol. Immunol. 251:91-98(2000).
DR EMBL; AF255911; AAF8124.1; -
DR EMBL; AJ291757; CAC20699.1; -
DR InterPro; IPR003006; -
DR InterPro; IPR003598; -
DR Pfam; PF00047; Ig; 2.
DR SMART; SM00408; IGC2; 1.
SQ SEQUENCE 298 AA; 33047 MW; 1124E0F07E6CF751 CRC64;

Query Match 29.7%; Score 486.5; DB 11; Length 298;
Best Local Similarity 36.7%; Pred. No. 9.3e-39;
Matches 114; Conservative 54; Mismatches 116; Indels 27; Gaps 9;

Qy 13 ARLPDFFLLFRGLIGAVNLKSN-----RTPVQGFESVELSCITDSQSDP 63
Db 2 ARSPQGLMLLLHYLVALDYHRKANGFSKDHREQVTYVIEFQEAAILAC-KTPKKTSS 60
Qy 64 RLEWKKIQDEQTYVFFNKTQGLAGRAEILGKTSKLNWTRDSALYRCEVARNDR 123
Db 61 RLEWKKV-GQGVSLVYQOALQGFDFKDAEMI-DFNIRIKNVRTSDAGEYRCEVSAPTEQ 118
Qy 124 -KEIDEIVIELTVQKPVTPVCRVPKAVPGVKMATLHCQSEGHPRPHYSWRNDVPLPT 182
Db 119 QGNLQEDKVMLEVLVAPVACEVPTSVTSGVVELRCQDREGNPAPETIWFKDG----T 174
Qy 183 DSRANPR---FRNSFHLNSETGLTFTAVHKDDSGQYVCIASNDAGSARCEQEMEYD 239
Db 175 SLIGNPKGTHNSYTNWTKSGILQFNWISKMDSGEYCEARNVGHRRCPGRMQVDV 234
Qy 240 LNIGGIIGVVLVAVLALITIGICCAVRRGYFINNKDGESYKPKGPDGVNYIRTDDEE 299
Db 235 -NISIGIATVTVVAVFVISCVLGTGYAQRKGYF-----SKETSFQKQSP--ASKVTMTSE 287
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Qy 300 GDFRHKSSFVI 310
Db 288 NDFRHKTSFII 298

RESULT 3
Q9JH1 PRELIMINARY; PRT; 300 AA.
AC Q9JH1;
DT 01-OCT-2000 (TReMBLrel. 15, Created)
DT 01-OCT-2000 (TReMBLrel. 15, Last sequence update)
DT 01-MAR-2001 (TReMBLrel. 16, Last annotation update)
DE JUNCTIONAL ADHESION MOLECULE JAM.
GN JAM.
OS Rattus norvegicus (Rat).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Rattus.
OX NCBI_TaxID=10116;
RN [1]
RP SEQUENCE FROM N.A.
RC STRAIN=SPRAGUE DAWLEY;
RA Mashima H., Kojima I.;
RL Submitted (JUN-2000) to the EMBL/GenBank/DBJ databases.
DR EMBL; AF276998; AAF78250.1; -
DR InterPro; IPR003006; -
DR InterPro; IPR003596; -
DR Pfam; PF00047; Ig; 2.
DR SMART; SM00406; IGV; 1.
SQ SEQUENCE 300 AA; 32369 MW; 45AE362A96158BFA CRC64;

Query Match 28.3%; Score 463.5; DB 11; Length 300;
Best Local Similarity 37.9%; Pred. No. 1.6e-36;
Matches 113; Conservative 49; Mismatches 121; Indels 15; Gaps 8;

Qy 20 LLLFRGLIGA-VNLKSNRTP----VVQEFESVELSCITDSQSDPRIEWKKIQDEQ 74
Db 11 LLELFTSMILGSLVQKGVSYPQAVQVPENDSVKLCIY--SGFSSPRVEKPKVGST 68
Qy 75 TTYVFFDNKIQDLAGRAEILGKTSKLNWTRDSALYRCEVARNDRKEIDEIVIELT 134
Db 69 TALVCYNNQITVPYADRV-TFSSGITFSSVTRKDNGEYTC-MVSEDDGQNGYGEVSIHLT 126
Qy 135 VOVKPVTVCVRKAVPVGKMATLHCQSEGHPRPHYSWRNDVPLPT-DSRANPRFNS 193
Db 127 VLVPPSKPTVSIPTSGTIGNRAVLTCSEHDSGSPSEYFWFKDGVPLTADAKKTRAFNS 186
Qy 194 SFHLNSETGLTFTAVHKDDSGQYVCIASNDAGSA-RCEQEMEYDNLNIGGIIGVLVW 252
Db 187 SYTIDPKSGDLVDFPVSADFSGEYCEAQCNGYGTAMRSEAVRMEAVELNVGIVAAVLVT 246
Qy 253 LAVIALITLGTCAYRRGYFINNKDGESYKPKGPDGVNYIRTDDEGDFRHKSSFVI 310
Db 247 LILLGLLFIWFAYSRGYFERTKKG----TAPGKKVIYQSPARSSEGEFKQTSSEFLV 300

RESULT 4
Q9Y5B2 PRELIMINARY; PRT; 259 AA.
AC Q9Y5B2;
DT 01-NOV-1999 (TReMBLrel. 12, Created)
DT 01-NOV-1999 (TReMBLrel. 12, Last sequence update)
DT 01-MAR-2001 (TReMBLrel. 16, Last annotation update)
DE JUNCTIONAL ADHESION MOLECULE.
OS Homo sapiens (Human).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
OX NCBI_TaxID=9606;
RN [1]
RP SEQUENCE FROM N.A.
RA Liu Y., Nusrat A., Schnell F.J., Walsh S., Reaves T.A., Pochet M.,
RA Foley C., Parkos C.A.;
```


GenCore version 4.5
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OM protein - protein search, using sw model

Run on: August 6, 2001, 09:33:36 ; Search time 19.31 Seconds
(without alignments)
330.554 Million cell updates/sec

Title: US-09-524-531A-15
Perfect score: 1637
Sequence: 1 MALRRPRLRLCARLPDFLL.....VNYRTDEGDFRHKSSFVI 310

Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 197339 seqs, 20590346 residues

Total number of hits satisfying chosen parameters: 197339

Minimum DB seq length: 0
Maximum DB seq length: 2000000000
Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries

Database : Issued Patents AA:*
1: /cgn2_6/ptodata/1/iaa/5A-COMB.pep:*
2: /cgn2_6/ptodata/1/iaa/5B-COMB.pep:*
3: /cgn2_6/ptodata/1/iaa/6A-COMB.pep:*
4: /cgn2_6/ptodata/1/iaa/6B-COMB.pep:*
5: /cgn2_6/ptodata/1/iaa/PTUS-COMB.pep:*
6: /cgn2_6/ptodata/1/iaa/backfiles1.pep:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	424	25.9	299	4	US-09-188-930-331
2	412	25.2	299	4	US-09-188-930-189
3	228.5	14.0	319	1	US-08-597-495B-22
4	169.5	10.4	390	2	US-08-979-424-1
5	160.5	9.8	365	4	US-08-928-383B-2
6	159.5	9.7	365	2	US-08-979-424-3
7	159.5	9.7	365	4	US-09-272-496-2
8	157.5	9.6	1101	3	US-08-986-485-2
9	155.5	9.5	612	2	US-08-752-307B-11
10	154	9.4	1501	2	US-08-447-464-3
11	154	9.4	1501	2	US-08-716-679-3
12	152.5	9.3	869	1	US-08-374-834-16
13	152.5	9.3	869	2	US-08-644-271-29
14	152	9.3	95	4	US-08-928-383B-18
15	150.5	9.2	698	2	US-08-602-725-36
16	150.5	9.2	734	2	US-08-389-459A-17
17	150.5	9.2	734	3	US-08-987-867A-17
18	147	9.0	365	4	US-08-928-383B-23
19	147	9.0	365	4	US-08-928-383B-24
20	146.5	8.9	315	2	US-08-414-657D-47
21	146.5	8.9	338	2	US-08-414-657D-42
22	146.5	8.9	338	2	US-08-414-657D-43
23	145.5	8.9	252	2	US-08-414-657D-59
24	145.5	8.9	287	2	US-08-414-657D-49
25	145.5	8.9	310	2	US-08-414-657D-45
26	145.5	8.9	338	2	US-08-414-657D-60
27	145.5	8.9	478	5	PCT-US95-08493-15

28	145.5	8.9	860	5	PCT-US95-08493-19
29	145.5	8.9	868	5	PCT-US95-08493-21
30	144.5	8.8	252	2	US-08-414-657D-56
31	144.5	8.8	287	2	US-08-414-657D-48
32	144.5	8.8	304	2	US-08-414-657D-44
33	144.5	8.8	308	2	US-08-414-657D-46
34	144.5	8.8	325	2	US-08-414-657D-2
35	144.5	8.8	325	2	US-08-414-657D-41
36	144	8.8	501	2	US-08-408-095-31
37	143.5	8.8	868	1	US-08-374-834-1
38	143.5	8.8	868	2	US-08-644-271-1
39	143	8.7	642	1	US-08-217-299-1
40	142	8.7	365	4	US-08-928-383B-26
41	140.5	8.6	1241	4	US-09-040-774-2
42	138.5	8.5	1447	4	US-09-041-886-25
43	138.5	8.5	1447	5	PCT-US94-05277-2
44	138	8.4	1091	3	US-08-986-485-5
45	137	8.4	607	2	US-08-752-307B-12

ALIGNMENTS

RESULT 1
US-09-188-930-331
; Sequence 331, Application US/09188930A
; Patent No. 6150502
; GENERAL INFORMATION:
; APPLICANT: Watson, James D.
; APPLICANT: Strachan, Lorna
; APPLICANT: Sleeman, Matthew
; APPLICANT: Onrust, Rene
; APPLICANT: Murlison, James Greg
; TITLE OF INVENTION: Compositions Isolated From Skin Cells
; TITLE OF INVENTION: and Methods For Their Use
; FILE REFERENCE: 11000.1011c1
; CURRENT APPLICATION NUMBER: US/09/188,930A
; CURRENT FILING DATE: 1998-11-09
; NUMBER OF SEQ ID NOS: 348
; SOFTWARE: FastSeq for Windows Version 3.0
; SEQ ID NO 331
; LENGTH: 299
; TYPE: PRT
; ORGANISM: Human
US-09-188-930-331

Query Match 25.9%; Score 424; DB 4; Length 299;
Best Local Similarity 32.8%; Pred. No. 2.1e-35;
Matches 101; Conservative 48; Mismatches 137; Indels 22; Gaps

QY	8	RRLCARLPDFLLLRGLIGAVNLKSSNRTPVVOEFESVELSCIIITDSOTSDPRIEW	67
DB	9	RKLCLL----FLAILLCLSLALGSGTVHSSEFVRIPENNPVKLSLAY--SGFSSPRVW	62
QY	68	KKIQDEQTYVFFDNKIQGDLAGRAEILGKTSLKINVTTRDSALYRCVAVNRDKRID	127
DB	63	KFDQDGTTRLCVYNNKITASYEDRVTF--PTGITKFSVTREDTGTVC--MVSEEGNSYG	120
QY	128	EIVIELTVQVKVTPVCRVPKAVPGCKMATLHCQSEGHPRPHYSWYRNDVPLPTDSRAN	187
DB	121	EYKVLIVLVPKSPKPTVINIPSSATIGNRAVLTCSEODGPPSEYTWFKDGIYVNP	180
QY	188	PRFRNSSFLHNSGTGLVFTAVHKDDSGOYCIASNDAGSARCEEQ--EMEVDNLNIGGI	246
DB	181	RAFSNSSVYLVNPTTGLVDFDPLSASDTGEYSCEARNGYGTPTMSNAVRNEAVRNVGIV	240
QY	247	GGVLVLAVALITIGICCAAYRGYFINNKDQGES-----YKNPGPDGVNYIRTDGEGDF	302
DB	241	AAVLVTLLIGLVFGWFAYSRGHFDRTKKTGSSKKVIYSQPS-----ARSEGEF	291
QY	303	RHKSSFVI 310	

Db 292 KQTSFLV 299

RESULT 2

US-09-188-930-189
; Sequence 189, Application US/09188930A

; Patent No. 6150502

; GENERAL INFORMATION:

; APPLICANT: Watson, James D.

; APPLICANT: Strachan, Lorna

; APPLICANT: Sleeman, Matthew

; APPLICANT: Onrust, Rene

; APPLICANT: Murison, James Greg

; TITLE OF INVENTION: Compositions Isolated From Skin Cells

; FILE REFERENCE: 11000.101c1

; CURRENT APPLICATION NUMBER: US/09/188, 930A

; CURRENT FILING DATE: 1998-11-09

; NUMBER OF SEQ ID NOS: 348

; SOFTWARE: FastSeq for Windows Version 3.0

; SEQ ID NO 189

; LENGTH: 299

; TYPE: PRI

; ORGANISM: Human

; FEATURE:

; NAME/KEY: UNSURE

; LOCATION: (247)...(247)

; NAME/KEY: UNSURE

; LOCATION: (289)...(289)

US-09-188-930-189

Query Match

Best Local Similarity 32.1%; Score 412; DB 4; Length 299;

Matches 99; Conservative 48; Mismatches 139; Indels 22; Gaps 7;

QY 8 RLRLCARLPDFLLLRGCLIGAVNLKSSNRTVPVQEFESVELSCIITDSQSDPRIEW 67

Db 9 KLLCLL----FILAILLCSLALGVSIVHSSEPEVRIPENNPKLSLAY--SGFSSPRVEM 62

QY 68 KKIODEQTYFFONKTOGLDLAGRAELIGKTSLKINWTRDLSALYRCEVVARNDREID 127

Db 63 KFDQGDTRLVCYNKNTASYEDRVTEL-PTGITFKSVTRDGTGTYC-MVSEEGGNSYG 120

QY 128 EIVTELTVQVAPVPCVRKXAVPVGKMATLHCQSEGHPRPHYSWYRNDVPLPTDSRAN 187

Db 121 EVKVLIVLVPSPPTNIPSSATIGNRAVLTCSEQDGPSPSEYTFKDGIVMPTNPKST 180

QY 188 PRFRNSSFHLNSETGLTVFTAVHKDDSGQYYCIASNDAGSARCEQ-EMEVYDLNIGII 246

Db 181 RAFNSSVLVNPTTGELVDFPLSASDTGEYSCEARNGYGTPTMTNNAVRMEAVERNVGV 240

QY 247 GGVLVAVLALILGICCAVRGYFFNNKQDGES----YKNPKPGDVNVIPTDEGDF 302

Db 241 AAVLVTVXILLGVFIWFAYSRGHFDRKTKGTSKKVIYSQPS-----ARSEXEF 291

QY 303 RHKSSEVI 310

Db 292 KQTSFLV 299

RESULT 3

US-08-597-495B-22

; Sequence 22, Application US/08597495B

; Patent No. 5712369

; GENERAL INFORMATION:

; APPLICANT: Old, Lloyd J.; Welt, Sydney; Ritter, Gerd;

; APPLICANT: Simpson, Richard J.; Nice, Edouard; Moritz, R. L.;

; APPLICANT: Catimel, B.; Ji, Hong; Burgess, Anthony W.;

; APPLICANT: Heath, Joan K.; White, Sara J.; Johnstone, Cameron

; TITLE OF INVENTION: Colon Cell and Colon Cancer Cell

; TITLE OF INVENTION: Associated Nucleic Acid Molecules, Protein And Peptides

; NUMBER OF SEQUENCES: 29

CORRESPONDENCE ADDRESS:

ADDRESSEE: Felfe & Lynch

STREET: 805 Third Avenue

CITY: New York City

STATE: New York

COUNTRY: USA

ZIP: 10022

COMPUTER READABLE FORM:

MEDIUM TYPE: Diskette, 3.5 inch, 360 kb storage

COMPUTER: IBM PS/2

OPERATING SYSTEM: PC-DOS

SOFTWARE: Wordperfect

CURRENT APPLICATION DATA:

APPLICATION NUMBER: US/08/597,495B

FILING DATE: 02-Feb-1996

CLASSIFICATION: 435

PRIOR APPLICATION DATA:

APPLICATION NUMBER: 08/511,876

FILING DATE: 04-Aug-1995

ATTORNEY/AGENT INFORMATION:

NAME: Hanson, No. 5712369man D.

REGISTRATION NUMBER: 30,946

REFERENCE/DOCKET NUMBER: LUD 5316.1

TELECOMMUNICATION INFORMATION:

TELEPHONE: (212) 688-9200

TELEFAX: (212) 838-3884

INFORMATION FOR SEQ ID NO: 22:

SEQUENCE CHARACTERISTICS:

LENGTH: 319 amino acids

TYPE: amino acid

TOPOLOGY: linear

US-08-597-495B-22

Query Match 14.0%; Score 228.5; DB 1; Length 319;

Best Local Similarity 25.7%; Pred. No. 2.4e-15;

Matches 79; Conservative 49; Mismatches 128; Indels 51; Gaps 14;

QY 29 IGAVNLKSSNRTVPVQEFESVELSCIITDSQSDPRIEWKKIQDEQTYVVF---FNNK- 83

Db 19 VDALSIVTPQDVLRSASOGKSVTLCTYHTSTSSREGLIQWDKLLLTHTERVVHPPFNKN 78

QY 84 -IQGDL-----AGRAELIGKTSLKINWTRDLSALYRCEVVARNDREIDVIELTV 135

Db 79 YHGEYKRVSVISNNAE-QSDASITIDQTMADNGTYECSVLSMDLEGNTKSRVRLV 137

QY 136 QVRPVTVCVRKXAVPVGKMATLHCQSEGHPRPHYSWYRNDV-----PLPTDSRANPRF 190

Db 138 LVPPSKPECGIEGETIIGNNIQLTCQSKGSPTPQYSMKRYNILNQPOPLAQPASGQP-- 195

QY 191 RNSSFHLNSETGLTVFTAVHKDDSGQYYCIASNDAGSARCE-EGEMEVYDLNIG--GII 246

Db 196 -----VSLKNISTDTSGYIYICSSNEEGTQFCNITVAVRSPSMNVALYVIA 242

QY 247 GGVLVAVLALILGICCAVRGYFIN--NKQDG-----ESYKNPKPGDVNVIPTDEGDF 298

Db 243 VGVVAALIIIGIIYYCCCC---RGKDDNTEDKEDARNREAYEFP--PEQLRELSRREE 297

QY 299 EGDPRHK 305

Db 298 EDDYRQE 304

RESULT 4

US-08-979-424-1

; Sequence 1, Application US/08979424

; Patent No. 5942606

; GENERAL INFORMATION:

; APPLICANT: Lal, Preeti

; APPLICANT: Corley, Neil C.

; TITLE OF INVENTION: VIRAL RECEPTOR PROTEIN

; NUMBER OF SEQUENCES: 3

; CORRESPONDENCE ADDRESS:

PS Claim 1; Fig 3; 59pp; English.

XX The present sequence is the human confluency regulated adhesion molecule
CC 1 (CRAM-1, also known as JAM-2). CRAM-1 is one of the vascular adhesion
CC proteins of the immunoglobulin superfamily (Ig Sf). The CRAM-1 protein
CC and coding sequence can be used in the treatment of cancer,
CC inflammation, to modulate cell-cell interactions and angiogenesis, and
CC in the modulation of wound healing.

XX Sequence 310 AA:

Query Match 100.0%; Score 1633; DB 21; Length 310;
Best Local Similarity 100.0%; Pred. No. 3.6e-124;
Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 MALSRLRLRLYARLPHPFLILLFRGCMTEAVNLKSSNNPVVHEPESVELSCITTHSQT 60

DB 1 malsrlrlrllyarlp hfilllllfrgcmleavnlksnnpvyhefesevelscitlthsgt 60

OY 61 SDPRIEMKKIODGQTTYYVEDNKKIOGDLGRDVFEGKTSLRIMWVTRSDSAIYRCEVAL 120

DB 61 sdprlwmkikdgqctyyvfndkigqdlgrtdvfegktslrimwvtrsdailyrceval 120

OY 121 NDRKEVDETTELIVQVKVTPVCRIPAAVPVCKATLQCOESEGYPRPHYSWRNDVPL 180

DB 121 ndrkevdeitellivqvktpvcrlpaavpvkctatlqcgeseqprphyswyrndvpl 180

OY 181 PIDSRRANPRFQNSSFHVNSEGTGLVFNVAHKDDSGQYCIASNDAGAACEQDMEVYDL 240

DB 181 pidsrranprfqnssfhvnsetgtlvfnavhkddsgqyciasndagaaceqgdmevyl 240

OY 241 NIAGIIGVLLVLIYLAIVTMGICAYRRGCFISSKODESYKSPGKHGQVNIYRTSEEG 300

DB 241 niagligvllvliylavltmgicayrrgcflsskqdesykpghqgvniyrtseseg 300

OY 301 DFRHKSSFYI 310

DB 301 dfrhksfvl 310

RESULT 2

AAB27278
ID AAB27278 standard; Protein; 310 AA.

AC AAB27278;

DT 23-FEB-2001 (first entry)

DE Murine confluency regulated adhesion molecule 1.

KM Immunoglobulin superfamily; Ig Sf; vascular adhesion molecule;

KW inflammation; cancer; wound; angiogenesis; mouse; JAM-2.

KM Confluency regulated adhesion molecule 1; CRAM-1; JAM-2.

OS Mus sp.

PN WO200053749-A2.

PD 14-SEP-2000.

PF 13-MAR-2000; 2000WO-EP02219.

PR 11-MAR-1999; 99EP-0200746.

PA (RMFD-) RMF DICTAGENE SA.

PI Imhof BA, Aurtrand-Lions M;

DR MPI: 2000-587436/55.

DR N:PSDB; AAA97189.

XX Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or

PT CRAM-2) polypeptide, useful for treatment of tumors, inflammation
PT reactions and modulating vascular permeability -

XX Example: Fig 8; 59pp; English.

XX The present sequence is the murine confluency regulated adhesion molecule
CC 1 (CRAM-1, also known as JAM-2). CRAM-1 is one of the vascular adhesion
CC proteins of the immunoglobulin superfamily (Ig Sf). The CRAM-1 protein
CC and coding sequence can be used in the treatment of cancer, inflammation,
CC to modulate cell-cell interactions and angiogenesis, and in the
CC modulation of wound healing.

XX Sequence 310 AA:

Query Match 100.0%; Score 1633; DB 21; Length 310;
Best Local Similarity 100.0%; Pred. No. 3.6e-124;
Matches 310; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 MALSRLRLRLYARLPHPFLILLFRGCMTEAVNLKSSNNPVVHEPESVELSCITTHSQT 60

DB 1 malsrlrlrllyarlp hfilllllfrgcmleavnlksnnpvyhefesevelscitlthsgt 60

OY 61 SDPRIEMKKIODGQTTYYVEDNKKIOGDLGRDVFEGKTSLRIMWVTRSDSAIYRCEVAL 120

DB 61 sdprlwmkikdgqctyyvfndkigqdlgrtdvfegktslrimwvtrsdailyrceval 120

OY 121 NDRKEVDETTELIVQVKVTPVCRIPAAVPVCKATLQCOESEGYPRPHYSWRNDVPL 180

DB 121 ndrkevdeitellivqvktpvcrlpaavpvkctatlqcgeseqprphyswyrndvpl 180

OY 181 PIDSRRANPRFQNSSFHVNSEGTGLVFNVAHKDDSGQYCIASNDAGAACEQDMEVYDL 240

DB 181 pidsrranprfqnssfhvnsetgtlvfnavhkddsgqyciasndagaaceqgdmevyl 240

OY 241 NIAGIIGVLLVLIYLAIVTMGICAYRRGCFISSKODESYKSPGKHGQVNIYRTSEEG 300

DB 241 niagligvllvliylavltmgicayrrgcflsskqdesykpghqgvniyrtseseg 300

OY 301 DFRHKSSFYI 310

DB 301 dfrhksfvl 310

RESULT 3

AAB27276
ID AAB27276 standard; Protein; 310 AA.

AC AAB27276;

DT 23-FEB-2001 (first entry)

DE Human confluency regulated adhesion molecule 1 #2.

KM Immunoglobulin superfamily; Ig Sf; vascular adhesion molecule;

KW inflammation; cancer; wound; angiogenesis; human;

KM Confluency regulated adhesion molecule 1; CRAM-1; JAM-2.

OS Homo sapiens.

PN WO200053749-A2.

PD 14-SEP-2000.

PF 13-MAR-2000; 2000WO-EP02219.

PR 11-MAR-1999; 99EP-0200746.

PA (RMFD-) RMF DICTAGENE SA.

PI Imhof BA, Aurtrand-Lions M;

DR MPI: 2000-587436/55.

DR N-PSDB; AAA95306.
XX
PT Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or
PT CRAM-2) polypeptide, useful for treatment of tumors, inflammation
PT reactions and modulating vascular permeability -
XX
PS Claim 2; Fig 6; 59pp; English.
XX
CC The present sequence is the human confluency regulated adhesion molecule
CC 1 (CRAM-1, also known as JAM-2). CRAM-1 is one of the vascular adhesion
CC proteins of the immunoglobulin superfamily (Ig SF). The CRAM-1 protein
CC and coding sequence can be used in the treatment of cancer, inflammation,
CC to modulate cell-cell interactions and angiogenesis, and in the
CC modulation of wound healing.
XX
SQ Sequence 310 AA;
XX
Y Match 86.3%; Score 1409; DB 21; Length 310;
Best Local Similarity 85.8%; Pred. No. 4.5e-106;
Thes 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;
XX
QY 1 MALSRLRLVLAARLPHEFLLLPFGCMIEAVNKKSNRPVYHEFSEVSLCITTSQT 60
Db 1 MALTPTPLICARLPDIFILLIFRGCLIGAVNKKSNRPVYHEFSEVSLCITTSQT 60
QY 61 SDRRIEKKIKDQCTVYVFDNKGIOGLAGRTDVFGRSLRWNRSDSAIRCEVVAL 120
Db 61 SDPIEKKIKDQCTVYVFDNKGIOGLAGRTDVFGRSLRWNRSDSAIRCEVVAL 120
QY 121 NDRKEVDRIELIVQKPYTPVCRIPAAVPCGTATLQCESEGYRPHYSWYRNDVPL 180
Db 121 NDRKEVDRIELIVQKPYTPVCRIPAAVPCGTATLQCESEGYRPHYSWYRNDVPL 180
QY 181 PTDSRRAPRRQNSFHNSTGTLVFNAVKKDSQGYCCYCLASNDAGARCEGDMERYDL 240
Db 181 PTDSRRAPRRQNSFHNSTGTLVFNAVKKDSQGYCCYCLASNDAGARCEGDMERYDL 240
QY 241 NIGGIIGVLAIVLAVIMGICGARRCGFTSSKODGESYKSPGKHGQNVYRTSEEG 300
Db 241 NIGGIIGVLAIVLAVIMGICGARRCGFTSSKODGESYKSPGKHGQNVYRTSEEG 300
QY 301 DFRKRSSEV 310
Db 301 DFRKRSSEV 310
RESULT 4
AB33457 standard: Protein; 310 AA.
AC AAB33457;
DT 29-JAN-2001 (first entry)
DE Human PRO1868 protein UNQ859 SEQ ID NO:193.
XX
XX Human: immune related disease; diagnosis; antinflammatory; cardiant;
XX dermatological; antithyroid; antirheumatic; immunosuppressive;
XX haemostatic; antichyroid; antidiabetic; neuroprotective;
XX antianaemic; hepatotropic; virucide; antiparasitic; antiallergic;
XX osteoarthritis; spondyloarthritis; systemic sclerosis; sarcoidosis;
XX idiopathic inflammatory myopathy; Sjogren's syndrome; thyroiditis;
XX autoimmune haemolytic anaemia; diabetes mellitus;
XX autoimmune thrombocytopenia; immune-mediated renal disease;
XX demyelinating disease; hepatobiliary disease; Whipple's disease;
XX inflammatory bowel disease; gluten-sensitive enteropathy;
XX autoimmune disease; immune-mediated skin disease; allergic disease;
XX immunological disease; transplantation associated disease;
XX graft rejection; graft-versus-host-disease.
OS Homo sapiens.

XX
PN WO200053758-A2.
XX
PD 14-SEP-2000.
XX
PE 02-MAR-2000; 2000MO-US05841.
XX
PR 08-MAR-1999; 99MO-US05028.
PR 10-MAR-1999; 99US-0123618.
PR 12-MAR-1999; 99US-0123957.
PR 23-MAR-1999; 99US-0125775.
PR 12-APR-1999; 99US-0128849.
PR 20-APR-1999; 99MO-US08615.
PR 28-APR-1999; 99US-0131445.
PR 04-MAY-1999; 99US-0132371.
PR 14-MAY-1999; 99US-0134287.
PR 02-JUN-1999; 99MO-US12252.
PR 23-JUN-1999; 99US-0141037.
PR 20-JUL-1999; 99US-0144758.
PR 26-JUL-1999; 99US-0145698.
PR 28-JUL-1999; 99US-0146222.
PR 01-SEP-1999; 99MO-US20111.
PR 08-SEP-1999; 99MO-US20594.
PR 13-SEP-1999; 99MO-US20944.
PR 15-SEP-1999; 99MO-US21090.
PR 15-SEP-1999; 99MO-US21547.
PR 05-OCT-1999; 99MO-US23089.
PR 29-OCT-1999; 99US-0162506.
PR 29-NOV-1999; 99MO-US28214.
PR 30-NOV-1999; 99MO-US28313.
PR 30-NOV-1999; 99MO-US28409.
PR 01-DEC-1999; 99MO-US28301.
PR 01-DEC-1999; 99MO-US28634.
PR 02-DEC-1999; 99MO-US28554.
PR 02-DEC-1999; 99MO-US28564.
PR 02-DEC-1999; 99MO-US28565.
PR 16-DEC-1999; 99MO-US30095.
PR 20-DEC-1999; 99MO-US30999.
PR 30-DEC-1999; 99MO-US31274.
PR 05-JAN-2000; 2000MO-US00277.
PR 06-JAN-2000; 2000MO-US00279.
PR 06-JAN-2000; 2000MO-US00376.
PR 11-FEB-2000; 2000MO-US03365.
PR 18-FEB-2000; 2000MO-US04341.
PR 18-FEB-2000; 2000MO-US04342.
PR 22-FEB-2000; 2000MO-US04414.
XX
XX (GETH) GENENTECH INC.
XX
PA Ashkenazi AJ, Baker KP, Goddard A, Gurney AL, Hebert C, Henzel W;
PI Kabakoff RC, Lu Y, Pan J, Pennica D, Shelton DL, Smith V;
PI Stewart TA, Tumas D, Watanabe CK, Wood WI, Yan M;
XX
DR WPI: 2000-572271/53.
DR N-PSDB; AAC58622.
XX
PT Sixty four PRO polypeptides, useful in the diagnosis and treatment of
PT immune related disorders, e.g. systemic lupus erythematosus, rheumatoid
PT arthritis, osteoarthritis, thyroiditis and diabetes mellitus -
XX
XX Claim 33; Fig 88; 309pp; English.
XX
CC The present invention describes sixty four human PRO proteins which can
CC be used in the treatment of immune related diseases. The human PRO
CC proteins, anti-PRO antibodies, agonists and antagonists are useful for
CC treating and diagnosing immune related disorders. The disorders are
CC selected from systemic lupus erythematosus, rheumatoid arthritis,
CC osteoarthritis, juvenile chronic arthritis, spondyloarthritis,
CC systemic sclerosis, idiopathic inflammatory myopathies, Sjogren's
CC syndrome, autoimmune thrombocytopenia, thyroiditis, diabetes mellitus,
CC anaemia, autoimmune thrombocytopenia, demyelinating diseases of the central
CC and peripheral nervous systems, hepatobiliary diseases, inflammatory

Db 121 ndrkeidelyelvtgvkpvrcvpkavpvgkmatlhqeseghprphyswyrndvpl 180
 QY 181 PTDGRANPRFONSSFHNSETGTLVFNAVHNRKDSGOYCYCIASNDAGARCGOMMEYDL 240
 Db 181 ptdgrnprfnssfhlnsetgtlvfaavhkdsgyyciasndagsarceegemeydl 240
 QY 241 NIAGIIGVLLVLIYLAIVITMGICCAVRRCGFISSKODGESYKSPGKHGYNVYRTSSEG 300
 Db 241 nlggligvllvliylavilallitglcaytrgyfflnkqdgseynkpgkpdgynvylrtdeeg 300
 QY 301 DFRHKSSFVI 310
 Db 301 dfrhkssfv1 310

RESULT 6

AAB80272 6
 I AAB80272 standard; Protein: 310 AA.

AC AAB80272;

D 24-APR-2001 (first entry)

XX Human PRO1868 protein.

XX Human; PRO; dermatological; antipsoriatic; cytostatic; antiinflammatory;
 KM antiParkinsonian neurotropic; neuroprotective; vulnerary; cardiact;
 KM antiangiogenic; vasotrophic; antiasthmatic; antirheumatic; cancer;
 KM antiarthritic; antiinfertility; antidiabetic; antiviral; diabetes;
 KM ophthalmological; gene therapy; skin disease; gastrointestinal disorder;
 KM Ischemia; Inflammation.

XX Homo sapiens.

XX MO200104311-A1.

XX 18-JAN-2001.

XX 22-FEB-2000; 2000MO-US04414.

XX 07-JUL-1999; 99US-0143048.
 PR 26-JUL-1999; 99US-0145698.
 PR 28-JUL-1999; 99US-0146222.
 PR 08-SEP-1999; 99MO-US20594.
 PR 13-SEP-1999; 99MO-US20944.
 PR 15-SEP-1999; 99MO-US21090.
 PR 15-SEP-1999; 99MO-US21547.
 PR 05-OCT-1999; 99MO-US23089.
 PR 29-NOV-1999; 99MO-US28214.
 PR 30-NOV-1999; 99MO-US28313.
 PR 16-DEC-1999; 99MO-US30095.
 PR 20-DEC-1999; 99MO-US30911.
 PR 20-DEC-1999; 99MO-US30999.
 PR 05-JAN-2000; 99MO-US00219.

XX (GETH) GENENTECH INC.

XX Ashkenazi AJ, Borstein D, Desnoyers L, Eaton DL, Ferrara N,
 PI Fliviaroff E, Fong S, Gao W, Gerber H, Gerritsen ME, Goddard A;
 PI Godowski PJ, Grimaldi CJ, Gurney AL, Hillian IU;
 PI Mather JP, Pan J, Paoni NF, Roy MA, Stewart TA, Tumas D;
 PI Williams PM, Wood WI;

XX WPI: 2001-081051/09.

DR N-PSDB; AAF72433.

XX Sixty one nucleic acids encoding PRO polypeptides which are useful in
 PT the treatment of skin diseases (e.g. psoriasis), cancers (e.g. lung
 PT squamous cell carcinoma) and neurodegenerative diseases (e.g. lung
 PT Alzheimer's disease) -

PS Claim 1; Fig 124; 39pp; English.
 XX

CC The present sequence is one of sixty one novel secreted and
 CC transmembrane PRO polypeptides. The PRO polypeptides are
 CC useful for treating skin diseases (e.g. psoriasis), cancers (e.g. lung
 CC squamous cell carcinoma), gastrointestinal disorders (e.g.
 CC enterocolitis), neurodegenerative diseases (e.g. Alzheimer's disease,
 CC Parkinson's disease), wound repair, cardiovascular disorders (e.g.
 CC endometrial bleeding angiogenesis, ischaemias such as coronary
 CC ischaemia, atherosclerosis), inflammatory disorders (e.g. asthma,
 CC rheumatoid arthritis, multiple sclerosis), infertility, AIDS and
 CC diabetes and retinal disorders such as retinitis pigmentosa.
 CC The PRO nucleic acids have applications in molecular biology, including
 CC use as hybridization probes, and in chromosome and gene mapping.
 XX

SQ Sequence 310 AA;

Query Match 86.3%; Score 1409; DB 22; Length 310;
 Best Local Similarity 85.8%; Pred. No. 4.5e-106;
 Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;

QY 1 MALSRRLRLRLRLPHEFLLLPRGCMIEAVNLKSSNRNPVHEFSVELSCITTHSQ 60
 Db 1 maltrprlrlcarlpdflflllfrgcllgavnlkssnrnpvhefsevelscitthsq 60
 QY 61 SDPRIEMKKIQDQGTYYVEDNKKIQGLAGRTDVGKTSLRIMVTRSDSAIYRCEVAL 120
 Db 61 sdprlemkkidqdeqtyvffdnkigglagrtelgktslrlmvtrdsalrycevar 120
 QY 121 NDKREVDITELIVQKPTVPCRIPAAYVCGTATLQOESGGRPHYSWRNDVPL 180
 Db 121 ndrkeidelyelvtgvkpvrcvpkavpvgkmatlhqeseghprphyswyrndvpl 180
 QY 181 PTDGRANPRFONSSFHNSETGTLVFNAVHNRKDSGOYCYCIASNDAGARCGOMMEYDL 240
 Db 181 ptdgrnprfnssfhlnsetgtlvfaavhkdsgyyciasndagsarceegemeydl 240
 QY 241 NIAGIIGVLLVLIYLAIVITMGICCAVRRCGFISSKODGESYKSPGKHGYNVYRTSSEG 300
 Db 241 nlggligvllvliylavilallitglcaytrgyfflnkqdgseynkpgkpdgynvylrtdeeg 300
 QY 301 DFRHKSSFVI 310
 Db 301 dfrhkssfv1 310

RESULT 7

AAB80383 7
 ID AAB80383 standard; Protein: 310 AA.

XX AAB80383;

XX 24-APR-2001 (first entry)

XX Secreted protein encoded by gene #13.

XX Secreted protein; human; autoimmune; hyperproliferation;
 KM cardiovascular; cerebrovascular; infection; food.

XX Homo sapiens.

XX MO200107459-A1.

XX 01-FEB-2001.

XX 20-JUL-2000; 2000MO-US19735.

XX 23-JUL-1999; 99US-0145220.

XX (HUMA-) HUMAN GENOME SCI INC.

XX Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore RA;
 PI Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsu H, GA;
 XX

DR WPI: 2001-123261/13.
XX New isolated nucleic acid encoding 29 secreted proteins, for
PI diagnosing, preventing and treating e.g. autoimmune,
PT hyperproliferative, cardiovascular, and ocular diseases or disorders
XX and microorganism infections
PS Claim 11; Page 538-539; 601pp; English.
XX The present invention relates to 29 human secreted proteins. The
CC invention is used to prevent autoimmune diseases e.g. rheumatoid
CC arthritis, hyperproliferative disorders e.g. neoplasms of the
CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
CC cerebrovascular disorders e.g. cerebral ischemia, angiogenesis,
CC nervous system disorders e.g. Alzheimer's disease, infections
CC caused by bacteria, viruses and fungi and ocular disorders e.g.
CC corneal infection. Also used in food preparations.
XX
SQ Sequence 310 AA:
Query Match 86.3%; Score 1409; DB 22; Length 310;
Best Local Similarity 85.8%; Pred. No. 4.5e-106;
Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;
QY 1 MALSRRLRLRLVLRPHPELLEFRGCMLEAVNLKSSNRPVHFESEVLSCTITHSQT 60
DB 1 malrrprlrlcarlpdfffflllffgcllgavnlksnrtlpvqgefesvelsciltdegt 60
QY 61 SPPRIEMKKIDGGQTYTYFEDNKIOGDLAGRTDVGKTSIRLWNTBDSAIYRCEVAL 120
DB 61 sppriemkkidggqtytyfednkiogdla grtdvgktsirlwntrbdsaiyrcevalr 120
QY 121 NRKEVDTEELIYOVKVPVCRIPAVPVGKATLQCOSEGYPRPHYSWYRNDVPL 180
DB 121 nrkevdteeliyovkvpcrvpcrpavpvgkmatlncgeseqprphyswyrndvpl 180
QY 181 PDSRANPRFQNSFHVNSGTGLVFNVAHKDSDGOYYCIASNDAGAARCEGQDMEVYDL 240
DB 181 pdsranprfqnspfhnsgtglvfnvahnkdsgoyyciasndagaarceegqdmeydl 240
QY 241 NIAGTIGVLYVLYAVITMGICCAVRRGCTISSKQDESKSPGKHGVNIRTSEEG 300
DB 241 niagtigvlyvlyavitmgiccavrrgctisskqdeskspgkhgvnirtseeg 300
QY 301 DFRHKSSEFYI 310
DB 301 dfrhkssefyi 310
RESULT 8
AAB80408 standard: protein; 310 AA.
XX
AC AAB80408;
XX
DT 24-APR-2001 (first entry)
XX
DE Secreted protein encoded by gene #38.
XX
KM Secreted protein; human; autoimmune; hyperproliferation;
KM cardiovascular; cerebrovascular; infection; food.
XX
OS Homo sapiens.
XX
PN WO200107459-A1.
XX
PD 01-FEB-2001.
XX
PF 20-JUL-2000; 2000WO-US19735.
XX
PR 23-JUL-1999; 99US-0145220.
XX

PA (HUMA-) HUMAN GENOME SCI INC.
XX Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore PA;
PI Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsoulis GA;
XX WPI: 2001-123261/13.
XX
XX New isolated nucleic acid encoding 29 secreted proteins, for
PT diagnosing, preventing and treating e.g. autoimmune,
PT hyperproliferative, cardiovascular, and ocular diseases or disorders
XX and microorganism infections
PS Claim 11; Page 557-558; 601pp; English.
XX The present invention relates to 29 human secreted proteins. The
CC invention is used to prevent autoimmune diseases e.g. rheumatoid
CC arthritis, hyperproliferative disorders e.g. neoplasms of the
CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
CC cerebrovascular disorders e.g. cerebral ischemia, angiogenesis,
CC nervous system disorders e.g. Alzheimer's disease, infections
CC caused by bacteria, viruses and fungi and ocular disorders e.g.
CC corneal infection. Also used in food preparations.
XX
SQ Sequence 310 AA:
Query Match 86.3%; Score 1409; DB 22; Length 310;
Best Local Similarity 85.8%; Pred. No. 4.5e-106;
Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;
QY 1 MALSRRLRLRLVLRPHPELLEFRGCMLEAVNLKSSNRPVHFESEVLSCTITHSQT 60
DB 1 malrrprlrlcarlpdfffflllffgcllgavnlksnrtlpvqgefesvelsciltdegt 60
QY 61 SPPRIEMKKIDGGQTYTYFEDNKIOGDLAGRTDVGKTSIRLWNTBDSAIYRCEVAL 120
DB 61 sppriemkkidggqtytyfednkiogdla grtdvgktsirlwntrbdsaiyrcevalr 120
QY 121 NRKEVDTEELIYOVKVPVCRIPAVPVGKATLQCOSEGYPRPHYSWYRNDVPL 180
DB 121 nrkevdteeliyovkvpcrvpcrpavpvgkmatlncgeseqprphyswyrndvpl 180
QY 181 PDSRANPRFQNSFHVNSGTGLVFNVAHKDSDGOYYCIASNDAGAARCEGQDMEVYDL 240
DB 181 pdsranprfqnspfhnsgtglvfnvahnkdsgoyyciasndagaarceegqdmeydl 240
QY 241 NIAGTIGVLYVLYAVITMGICCAVRRGCTISSKQDESKSPGKHGVNIRTSEEG 300
DB 241 niagtigvlyvlyavitmgiccavrrgctisskqdeskspgkhgvnirtseeg 300
QY 301 DFRHKSSEFYI 310
DB 301 dfrhkssefyi 310
RESULT 9
AAB80409 standard: protein; 310 AA.
XX
AC AAB80409;
XX
DT 24-APR-2001 (first entry)
XX
DE Secreted protein encoded by gene #39.
XX
KM Secreted protein; human; autoimmune; hyperproliferation;
KM cardiovascular; cerebrovascular; infection; food.
XX
OS Homo sapiens.
XX
PN WO200107459-A1.
XX
PD 01-FEB-2001.
XX

XX 20-JUL-2000; 2000MO-US19735.
PF
XX
PR 23-JUL-1999; 99US-0145220.
XX
PA (HUMA-) HUMAN GENOME SCI INC.
XX
PI Rosen CA, Ruben SM, Ebner R, Duan RD, Ni J, Soppet DR, Moore PA,
PI Shi Y, Lafleur DW, Olsen HS, Birse CE, Komatsoulis GA;
XX
DR WPI; 2001-123261/13.
XX
PT New isolated nucleic acid encoding 29 secreted proteins for
PT diagnosing, preventing and treating e.g. autoimmune,
PT hyperproliferative, cardiovascular, and ocular diseases or disorders
PT and microorganism infections -
XX
XX
P Claim 11; Page 559-560; 601pp; English.
XX
CC The present invention relates to 29 human secreted proteins. The
CC invention is used to prevent autoimmune diseases e.g. rheumatoid
CC arthritis, hyperproliferative disorders e.g. neoplasms of the
CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
CC cerebrovascular disorders e.g. cerebral ischemia, angiodenesis,
CC nervous system disorders e.g. Alzheimer's disease, infections
CC caused by bacteria, viruses and fungi and ocular disorders e.g.
CC corneal infection. Also used in food preparations.
XX
SQ Sequence 310 AA:

Query Match 86.3%; Score 1409; DB 22; Length 310;
Best local Similarity 85.8%; Pred. No. 4.5e-106;
Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;

QY 1 MAISRRLRLYLARLPFLLLFRCGMTEAVNIKSSNRNPVYHEFSVELSCITTHSQT 60
DB 1 maltrprlrlcarlpdfillllfrgcllgavnlksntrpvvgfsvelsclltsqt 60
QY 61 SDRRIEKKIODGOTVYVYDNKIQGLAGRTDVFECTSLRINWVTRSDSAIRCEVVAL 120
DB 61 sdprliewkklqdegctlyvfdnkigdaeraellgktsikimvtrrdalrycevar 120
QY 121 NDRKEVDITIELVQKPYTPVCRIPAAVPVGTATLQCOESGYPHYSWYRNDVPL 180
DB 121 ndrkeidvltelvtgkpytpvcrypkavpygkmatlhqeseghprphyswyrndvpl 180
QY 121 ndrkeidvltelvtgkpytpvcrypkavpygkmatlhqeseghprphyswyrndvpl 180
D 121 ndrkeidvltelvtgkpytpvcrypkavpygkmatlhqeseghprphyswyrndvpl 180
QY 181 PTDSRANPRFONSSFHVNSFTGLVFNVAHKDQGYTCIASNDAGAARCEGDMEVYDL 240
DB 181 ptdsranprfonsfhvnsftglvfnvahnkdsqgytciasndagsarceegemeydl 240
QY 241 NINGIIGVVLVILAVITMGICAAVRRCFTSSKODGSYKSPGKHDCVNTIRTSSEG 300
DB 241 niggilggvvlvvlavilalilgicccayrryflnnkqdesyknpgkpdgvnylrrtdeeg 300
QY 301 DFRHKSSEFVI 310
DB 301 dfhkssefvl 310

RESULT 10
AAB38333
ID AAB38333 standard; Protein; 311 AA.
XX
AC AAB38333:
XX
DT 31-JAN-2001 (first entry)
XX
DE Human secreted protein encoded by gene 13 clone HAPSAT9.
XX
KW Immunosuppressive; antiarthritis; antirheumatic; antiproliferative;
KW cytostatic; cardiant; vasotropic; cerebroprotective; neuroprotective;
KW nootropic; antibacterial; virucide; fungicide; ophthalmological; human;

KW vulnerable; gene therapy; infection; secreted protein.
XX
OS Homo sapiens.
XX
PN WO200061623-A1.
XX
PD 19-OCT-2000.
XX
PF 06-APR-2000; 2000MO-US08979.
XX
PR 09-APR-1999; 99US-0128693.
PR 26-APR-1999; 99US-0130991.
XX
PA (HUMA-) HUMAN GENOME SCI INC.
XX
PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;
PI Lafleur DW, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;
PI Young PE;
XX
XX
DR WPI; 2000-647418/62.
XX
PT New nucleic acid molecules encoding 62 human secreted proteins for
PT diagnosing, preventing, treating or ameliorating medical conditions and
PT used as food additives or preservatives -
XX
XX
P Claim 11; Page 603-604; 716pp; English.
XX
CC Sequences AAB38321-B38396 represent the amino acid sequences of 62
CC human secreted proteins encoded by the genes AAB69512-C69587. The genes
CC and proteins are useful for preventing, ameliorating or treating medical
CC conditions, e.g. by protein or gene therapy. The genes are isolated from
CC a range of human tissues disclosed in the specification. The nucleic
CC acids, proteins, antibodies and (ant)agonists are useful in the
CC diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.
CC rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms
CC of the breast or liver; (c) cardiovascular disorders e.g. cardiac
CC arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)
CC angiodenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)
CC infections caused by bacteria, viruses and fungi; and (h) ocular
CC disorders e.g. corneal infection. The polypeptides can also be used to
CC aid wound healing and epithelial cell proliferation, to prevent skin
CC aging due to sunburn, to maintain organs before transplantation, for
CC supporting cell culture of primary tissues, to regenerate tissues and in
CC chemotaxis.
XX
SQ Sequence 311 AA:

Query Match 86.3%; Score 1409; DB 21; Length 311;
Best local Similarity 85.8%; Pred. No. 4.5e-106;
Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;

QY 1 MAISRRLRLYLARLPFLLLFRCGMTEAVNIKSSNRNPVYHEFSVELSCITTHSQT 60
DB 1 maltrprlrlcarlpdfillllfrgcllgavnlksntrpvvgfsvelsclltsqt 60
QY 61 SDRRIEKKIODGOTVYVYDNKIQGLAGRTDVFECTSLRINWVTRSDSAIRCEVVAL 120
DB 61 sdprliewkklqdegctlyvfdnkigdaeraellgktsikimvtrrdalrycevar 120
QY 121 NDRKEVDITIELVQKPYTPVCRIPAAVPVGTATLQCOESGYPHYSWYRNDVPL 180
DB 121 ndrkeidvltelvtgkpytpvcrypkavpygkmatlhqeseghprphyswyrndvpl 180
QY 181 PTDSRANPRFONSSFHVNSFTGLVFNVAHKDQGYTCIASNDAGAARCEGDMEVYDL 240
DB 181 ptdsranprfonsfhvnsftglvfnvahnkdsqgytciasndagsarceegemeydl 240
QY 241 NINGIIGVVLVILAVITMGICAAVRRCFTSSKODGSYKSPGKHDCVNTIRTSSEG 300
DB 241 niggilggvvlvvlavilalilgicccayrryflnnkqdesyknpgkpdgvnylrrtdeeg 300
QY 301 DFRHKSSEFVI 310

Db 301 dfrhksfvl 310

RESULT 11

AAB38383 AAB38383 standard; Protein; 311 AA.

AC AAB38383;

DE 31-JAN-2001 (first entry)

Human secreted protein encoded by gene 13 clone HAPSA79.

Immunosuppressive; antiarthritic; antirheumatic; antiproliferative;
cytostatic; cardiac; vasotropic; cerebroprotective; neuroprotective;
nocrotropic; antibacterial; virucide; fungicide; optalmalogical; human;
vulnerary; gene therapy; infection; secreted protein.

OS Homo sapiens.

PN WO200061623-A1.

XX 9-OCT-2000.

PF 06-APR-2000; 2000WO-US08979.

PR 09-APR-1999; 99US-0128693.

PR 26-APR-1999; 99US-0130991.

PA (HUMA-) HUMAN GENOME SCI INC.

PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;

PI Lafleur DW, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;

PI Young PE;

PI WPI; 2000-647418/62.

New nucleic acid molecules encoding 62 human secreted proteins for
diagnosing, preventing, treating or ameliorating medical conditions and
used as food additives or preservatives -

Claim 11; Page 642-643; 716pp; English.

Sequences AAB38321-B38396 represent the amino acid sequences of 62

human secreted proteins encoded by the genes AAC69512-C69587. The genes

and proteins are useful for preventing, ameliorating or treating medical

conditions, e.g. by protein or gene therapy. The genes are isolated from

a range of human tissues disclosed in the specification. The nucleic

acids, proteins, antibodies and (ant)agonists are useful in the

diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.

rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms

of the breast or liver; (c) cardiovascular disorders e.g. cardiac

arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)

angioogenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)

infections caused by bacteria, viruses and fungi; and (h) ocular

disorders e.g. corneal infection. The polypeptides can also be used to

aid wound healing and epithelial cell proliferation, to prevent skin

aging due to sunburn, to maintain organs before transplantation, for

supporting cell culture of primary tissues, to regenerate tissues and in

chemotaxis.

Sequence 311 AA;

Query Match 86.3%; Score 1409; DB 21; Length 311;

Best Local Similarity 85.8%; Pred. No. 4.5e-106;

Matches 266; Conservative 18; Mismatches 26; Indels 0; Gaps 0;

1 MALSRLRLRLVLRPHFLFLFRGCMLEAVNLKSSNNRPVYHEESELSCITTHSOT 60

1 MLRRPRLRLRLVLRPHFLFLFRGCMLEAVNLKSSNNRPVYHEESELSCITTHSOT 60

QY 61 SDPRLEMKKIDQGTYYVFNKIOGDLGRDVEGKTSRLRMVTRSDSATYRCEVVAL 120

Db 61 sdprlewkkgdeqtlyvfnfndkigdlagraellygktslkimvtrrdsalryceav 120

QY 121 NDRKEVDEITIELVQVKVTPVCRIPAAVPYGKATITLQCSSEGYPRPHYSWRNDVPL 180

Db 121 ndrkeideivleltvqvktpvcrcvpkavpvgkmalchcgeseghprphyswyrndvp1 180

QY 181 PDRSRANPREFONSFPVNSEGTILVFNNAVHKDSDGOYCIASNDGAARCEQDDEHYDL 240

Db 181 pdrsrnprfonsfpvnsegtlvtfnnavhkdsdsgoyyciasndagsarceeqdehdydl 240

QY 241 NIAGIIGVLYLVLYAVITMGICCAVRRGCEISSKODESYSPKGDHGVNVIYRTSEEG 300

Db 241 niagiigvlylvlyavltmgiccavrrgcceisskodesyspkgdhgvnyvityrtseeg 300

QY 301 DFRHKSFPYI 310

Db 301 dfrhksfvl 310

RESULT 12

AAB38384 AAB38384 standard; Protein; 311 AA.

AC AAB38384;

DE 31-JAN-2001 (first entry)

Human secreted protein encoded by gene 13 clone HAPSA79.

Immunosuppressive; antiarthritic; antirheumatic; antiproliferative;
cytostatic; cardiac; vasotropic; cerebroprotective; neuroprotective;
nocrotropic; antibacterial; virucide; fungicide; optalmalogical; human;
vulnerary; gene therapy; infection; secreted protein.

OS Homo sapiens.

PN WO200061623-A1.

XX 19-OCT-2000.

PF 06-APR-2000; 2000WO-US08979.

PR 09-APR-1999; 99US-0128693.

PR 26-APR-1999; 99US-0130991.

PA (HUMA-) HUMAN GENOME SCI INC.

PI Ruben SM, Ni J, Komatsoulis GA, Rosen CA, Soppet DR, Shi Y;

PI Lafleur DW, Olsen HS, Ebner R, Florence KA, Moore PA, Birse CE;

PI Young PE;

PI WPI; 2000-647418/62.

New nucleic acid molecules encoding 62 human secreted proteins for
diagnosing, preventing, treating or ameliorating medical conditions and
used as food additives or preservatives -

Claim 11; Page 643-644; 716pp; English.

Sequences AAB38321-B38396 represent the amino acid sequences of 62

human secreted proteins encoded by the genes AAC69512-C69587. The genes

and proteins are useful for preventing, ameliorating or treating medical

conditions, e.g. by protein or gene therapy. The genes are isolated from

a range of human tissues disclosed in the specification. The nucleic

acids, proteins, antibodies and (ant)agonists are useful in the

diagnosis, treatment and prevention of: (a) autoimmune diseases e.g.

rheumatoid arthritis; (b) hyperproliferative disorders e.g. neoplasms

of the breast or liver; (c) cardiovascular disorders e.g. cardiac

arrest; (d) cerebrovascular disorders e.g. cerebral ischemia; (e)

angioogenesis; (f) nervous system disorders e.g. Alzheimer's disease; (g)

infections caused by bacteria, viruses and fungi; and (h) ocular

CC disorders e.g. corneal infection. The polypeptides can also be used to
CC aid wound healing and epithelial cell proliferation, to prevent skin
CC aging due to sunburn, to maintain organs before transplantation, for
CC supporting cell culture of primary tissues, to regenerate tissues and
CC chemotaxis.

SQ Sequence 311 AA;

SQ Sequence 311 AA;

Query Match	86.3%	Score 1409;	DB 21	Length 311;
Best Local Similarity	85.8%	Pred. No. 4.5e-106;		
Matches 266;	Conservative 18;	Mismatches 26;		
			Indels 0;	Gaps 0;

QY	1	MAISRRRLRLRYALPHFFILLFRCGIMAVLNKSSNRPNVHFEFSVELSCITHSQT	60
QY	1	malrrprlrcarlpcffilllllfrglllgavnlksnrtpvqgefesvelscitdsqt	60
Db	1		
QY	61	SDPIREKKIKODGTYVYVEDNKICQGLARTDVFEGKTSLRINWVTRSDSAIRCEYVAL	120
QY	61	sdpiirekkikqdeqtlvyfvdnkigqlagdraaelllgftslkimlvtrdsalyrcevar	120
Db	61		
QY	121	NDRKEVDEITIELIVQKPYTPVCRIAAVPVCKTATLCOOSEGYPRPYHSWRNDVPL	180
QY	121	ndrkeideltvltvgykpytpvcrypkavpyvgmaltlhqeseqhprprrhsywrndvpl	180
Db	121		
QY	181	PTDSRAPRRQNSSEFHNSETGLVFAVNAVKKDSGQYTCIASNDACARREGDMEYDL	240
QY	181	ptdsraprrtfnssfhlnsetglvtfaavhkdsggyctiasndagsarceqemeydl	240
Db	181		
QY	241	NIAGIIGCVLVLVLAVITMGICACARRCCFSSKQDSEYKSPGKHDDVANYIRTSSEG	300
QY	241	niggiigvvlvvlavlaaitlgltcocayrrtyflnkdgsesymnprrpddgvnylrrtdeeg	300
Db	241		
QY	301	DFRKSSFEVI 310	
QY	301	dfrrksfevl 310	
Db	301		

RESULT	13
AAB80431	
ID	AAB80431 standard; peptide; 339 AA

AC	AAB80431;
XX	
DT	24-APR-2001 (first entry)
XX	
DD	Gene #13 associated peptide #1

KT- Secreted protein; human; autolimmune; hyperproliferation; cardiovascular; cerebrovascular; infection; food.

OS Homo sapiens.

PN W0200107459-A1.

PD 01-FEB-2001.

20-JUL-2000; 2000WO-US19735.

PR 23-JUL-1999; 99US-0145220.

PA (HUMA-) HUMAN GENOME SCI INC.

PI	Rosen CA,	Ruben SM,	Ebner R,	Duan RD,	Ni J,	Soppet DR,	Moore PA
PI	Shi Y,	laflleur DW,	Olsen HS,	Blrse CE,	Komatsoulis GA,		

DR WPI; 2001-123261/13

PT New isolated nucleic acid encoding 29 secreted proteins, for
diagnosing, preventing and treating e.g. autoimmune,
hyperproliferative, cardiovascular, and ocular diseases or disorders
PT and microorganism infections -

PS Disclosure; Page 75; 601pp; English.

CC The present invention relates to 29 human secreted proteins. The
CC invention is used to prevent autoimmune diseases e.g. rheumatoid
CC arthritis, hyperproliferative disorders e.g. neoplasms of the
CC breast or liver, cardiovascular disorders e.g. cardiac arrest,
CC cerebrovascular disorders e.g. cerebral ischaemia, angiosenesis,
CC nervous system disorders e.g. Alzheimer's disease, infections
CC caused by bacteria, viruses and fungi and ocular disorders e.g.
CC corneal infection. Also used in food preparations.

SQ	Sequence	339	AA;
----	----------	-----	-----

Query Match	86.3%	Score 1409;	DB 22;	Length 339;
Best Local Similarity	85.8%	Pred. No. 5e-106;		
Matches 266; Conservative	18;	Mismatches 26;	Indels 0;	Gaps 0;

Qy	1	MAISRRRLRLYLALPHFFLLLFRCGMIAVANNSSNRPVHFEFVSCLCITHSQ	60
Db	30	malrrprlrlcarlpofflllllfrglglavannkssnrtrpvpvgfsvslcldsq	89
Qy	61	SDPRLEKKIQDQGTTFVYVEDNKRIOGDLAGRDTDFGKTSLRIMNWTRSDSAIRCEVVAL	120
Db	90	sdprlekkkqdegtfvyffdnk:lgdlagraelgktslkimnwtrdsalrycevar	149
Qy	121	NDRKEVDEITELIVQYKPVTPVPCRIAPAAVPVCGKTATLQCOESEGYRPRHYSWTRNDVPL	180
Db	150	ndrkeidelvltlvqykpvtpvcrcvphkavpvgkmatllhcgeseqhprphyswtrndvpl	209
Qy	181	PTDSRANPRPNSSFFHNSETGTLVFAVNAVKKDSGQYTCIASNDAGAACREGDMEYTL	240
Db	210	ptdsranprfnssfhlnsetgltvfaavkhddsgqyctiasndagsarceegemeytl	269
Qy	241	NINGITGVLVLLVLAIVIMGTCOACARBCFTSSKDDGSEYKSPGKHDDVNTIRTSEEG	300
Db	270	nlgglvgvllvllavlaalctglccayryyflnnkdgsgsyxnpgkpdgvnyrltdeeg	329
Qy	301	DFRHSSEFVI 310	
Db	330	dfrhssfvvl 339	

RESULT	14
AAV96294	
ID	AAV96294 standard; protein; 310 AA

AC AAY96294 ;

DT 16-AUG-2000 (first entry)

DE Human IGFAM-6 Immunoglobulin.

KW Human; immunoglobulin; IGFAM-6; IGFAM; immune disorder; cancer;
infection; inflammation; haematopolesis; AIDS; allergy.

05 Homo sapiens

FT	Key	Location/Qualifiers
FT	Peptide	1..30
FT		/label= signal_peptide
FT	Protein	31..310
FT		/label= IGFAM-6
FT	Domain	46..117
FT		/label= Ig-domain
FT	Domain	153..221
FT		/label= Ig-domain
FT		238..260
FT	Domain	/label= Transmembrane_domain

PN	WO200029583-A2.
XX	
PD	25-MAY-2000.

XX 19-NOV-1999; 99WO-US27566.
 PF 19-NOV-1999; 99US-0113635.
 PR 22-DEC-1998; 98US-0113635.
 PR 07-APR-1999; 99US-0128194.
 XX (INCY-) INCYTE PHARM INC.
 XX Yue H, Tang YT, Corley NC, Guegler KJ, Gorgone GA, Baughn MR;
 PI Lu DM, Lal P, Hillman JL, Yang J;
 XX WPI: 2000-387796/33.
 DR N-PSDB: AAA27386.
 XX
 PT Immunoglobulin superfamily proteins, the agonist and antagonist of the
 PT protein is useful for preventing and treating disorders associated with
 PT altered levels of the protein such as cancer, immune system disorders
 PT
 PE Claim 1: Page 82-83; 105pp; English.
 XX
 CC The present sequence is the human immunoglobulin superfamily protein
 CC GFRM-6. Its gene was isolated from a cDNA library of leg
 CC tissue. It is expressed in reproductive, nervous and
 CC cardiovascular tissue, where cancer and inflammation are common. The
 CC gene, protein, its antibodies, agonists and antagonists are suitable for
 CC diagnosing and treating many diseases, including cancer, immune system
 CC disorders (such as inflammation, AIDS, allergies, anaemia,
 CC arteriosclerosis, asthma, atherosclerosis, cholecystitis, Crohn's
 CC disease, diabetes mellitus, emphysema, Graves' disease, hepatitis,
 CC multiple sclerosis, psoriasis, rheumatoid arthritis, scleroderma,
 CC systemic lupus erythematosus and ulcerative colitis), complications of
 CC cancer, haemodialysis and extracorporeal circulation, trauma and
 CC hematopoietic cancer (such as leukaemia) and infections caused by
 CC bacteria, viruses, fungi or parasites.
 XX
 SQ Sequence 310 AA:
 Query Match 85.8%; Score 1401; DB 21; Length 310;
 Best Local Similarity 85.5%; Pred. No. 2e-105; Mismatches 27; Indels 0; Gaps 0;
 Matches 265; Conservative 18; Mismatches 27; Indels 0; Gaps 0;
 QY 1 MALSRRLRLYLARLPHEFLLEFRGCMLEAVNLKSSNNPVVHEFESVLSCTITHSQT 60
 DB 1 mlrtrprlrlcarlpdfflllffrclglavnlksntprvqetsevelscitldsq 60
 QY 61 SDPRIMWKIKIDGQITTYVPDNKIOGDLGRIDVFEGKTSIRTNVTRSDSAIRCEVAL 120
 DB 61 sdprlwmkikidqetlyvfdnkgldgrlrelglktsiklwnvtrdsalrycevar 120
 QY 121 NDKREVDTEITLIVOKPVPYCRIPAAVPGVKTATLCOOSEGVPHPYSVRYNDVPL 180
 DB 121 ndkredevtelvkvpcvcrvkaavpvgkmatlncoseegvnprrysvryndvpl 180
 QY 181 PDDSRANRFQSSFFHVNSETGLVFNNAVHKDSDGQYCIASNDACAACCEGDMEVYLD 240
 DB 181 pddsrnrfqssffhvnsetglvfnnavhkdsdgyyciasndacaacegdmeyld 240
 QY 241 NTAGITIGVLLVAVITVMGICAYRRGCTSSKQDGBSYSPCKHDGVNTRTSEEG 300
 DB 241 ntgitigvllvavitvmgicayrrgctsskqdgbsyspckhdgvntrtseeg 300
 QY 301 DEPHKSSFYI 310
 DB 301 dtrhksfvl 310

AC AAB39254;
 XX 02-FEB-2001 (first entry)
 DT Human secreted protein sequence encoded by gene 15 SEQ ID NO:134.
 DE
 XX Human; secreted protein; immunosuppressive; antiarthritic; antirheumatic;
 KW antiproliferative; cytostatic; cardiast; vasotropic; cerebroprotective;
 KW neurotropic; neuroprotective; antibacterial; virucide; fungicide; neoplasm;
 KW ophthalmological; autoimmune disease; rheumatoid arthritis; angiogenesis;
 KW hyperproliferative disorder; cardiovascular disorder; infection;
 KW cerebrovascular disorder; nervous system disorder; ocular disorder;
 KW wound healing; chemotaxis.
 XX
 OS Homo sapiens.
 XX WO200056754-A1.
 PN 28-SEP-2000.
 PD 16-MAR-2000; 2000WO-US06792.
 PF 19-MAR-1999; 99US-0125362.
 PR 10-DEC-1999; 99US-0169980.
 XX (HUMA-) HUMAN GENOME SCI INC.
 PA Rosen GA, Ruben SM, Komatsoulis G;
 PI WPI: 2000-579483/54.
 DR N-PSDB: AAC74237.
 XX
 PT Isolated nucleic acid molecule encoding a human secreted protein is
 PT used in preventing, treating or ameliorating a medical condition -
 PT
 PS Disclosure: Page 32; 434pp; English.
 XX
 CC The polynucleotide sequences given in AAC74223-C74279 encode the human
 CC secreted proteins represented in AAB39179-B39226. Sequences
 CC AAB39227-B39308 are alternative proteins encoded by the genes, and also
 CC protein sequences with which they share homology. The proteins have
 CC activities based on the tissues and cells in which they are expressed.
 CC Examples of activities include: immunosuppressive; antiarthritic;
 CC antirheumatic; antiproliferative; cytostatic; cardiast; vasotropic;
 CC cerebroprotective; neurotropic; neuroprotective; antibacterial; virucide;
 CC fungicide; and ophthalmological. The human secreted proteins,
 CC polynucleotides, antagonists and agonists of the invention may be useful
 CC in the treatment, prevention, and/or diagnosis of various disease,
 CC disorders and conditions such as autoimmune diseases e.g. rheumatoid
 CC arthritis, hyperproliferative disorders e.g. neoplasms of the breast or
 CC liver, cardiovascular disorders e.g. cardiac arrest, cerebrovascular
 CC disorders e.g. cerebral ischaemia, angiogenesis, nervous system disorders
 CC e.g. Alzheimer's disease, infections caused by bacteria, viruses and
 CC fungi and ocular disorders e.g. corneal infection. The polypeptides can
 CC also be used to aid wound healing and epithelial cell proliferation, to
 CC regenerate tissues, maintain organs before transplantation, in
 CC chemotaxis and as a food additive or preservative e.g. to increase
 CC storage capabilities. Sequences AAC74214-C74222 and AAB39178 are used
 CC during the isolation and characterisation of the genes of the invention.
 XX
 SQ Sequence 285 AA:
 Query Match 80.4%; Score 1313; DB 21; Length 285;
 Best Local Similarity 85.6%; Pred. No. 2.3e-98; Mismatches 23; Indels 0; Gaps 0;
 Matches 244; Conservative 18; Mismatches 23; Indels 0; Gaps 0;
 QY 26 GCMIEAVNLKSSNNRPVHFEFESVLSCTITHSQTSDPRIMWKIKIDGQITTYVPDNKIQ 85
 DB 1 gcliegavnlksntprvqetsevelscitldsqsdprlwmkikidqetlyvfdnkg 60
 QY 86 GDLGRIDVFEGKTSIRTNVTRSDSAIRCEVALNDKREVDTEITLIVOKPVPYCR 145
 DB 86 gdlgrtdvfgktslrtnvtrsdasaircevalndkredevtelvkvpcvcrvkaavpvgkmatlncoseegvnprrysvryndvpl 145

Db 61 gdlagraellyktslkimvlttridsalyrcevarndrkxideivleltvqvkpvtpycr 120
Qy 146 IPAAPVPGKTATLQCESEGYPRPHYSMYRNDVPLPTDSRANPRFONSSFHVNSEGTLY 205
Db 121 vpkxvpygkmatlhcgeseqhprphysvyrndvplctdranprfrnssfhnsetgtlv 180
Qy 206 FNAVHKDDSGOYCIASNDAGAACREGODMEVYDLNLAGIIGVLYVLIYLAVTMGICC 265
Db 181 ftavhkddsgyyciasndagsarceeqemevydlnlgylgvlvlaiaaltlglcc 240
Qy 266 AYRRGEFSSKOGESYKSPGKHGCVNYIRTSSEGDFFRHKSSFYI 310
Db 241 ayrrgyflnkgdgesyknpgkpdgvnyirtdeegdltrhkssivl 285

Search completed: August 6, 2001, 09:33:05
Jame: 216 sec

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Db      1 gcllgavnlkssnrltpvvgfsvslcildsqtsdprlwkxkldqetlyvlfchkiq 60
Oy      86 GDLAQRDVEGKTLRIWNTSRSDAIVRCEVALNDRKEVDITIELIVQVKRPVTPYCR 145
Db      61 gdlagrelilgktslklnvrrtsalrycevarndtkxideiveltvkvkptvpcr 120
Oy      146 IPAAPVPGKATTAQCQSEGYPRPHYSWYRNDVPLPTDSRANRPFQNSFHVNSEGTGLV 205
Db      121 vpkxvpgkmalchcgesegbprphyswyrndvplptdsranrpfnsfhlntsetglv 180
Oy      206 FNAVHKDSDGYVCIASNDAGAACRCEGDMFVYDLNAGIIGVGLVYLIVAVITMGIC 265
Db      181 ftavhkddsgqyyciasndagsarceegemevdi19g1lgv1av1a1a1l1g1cc 240
Oy      266 AYRRCGFSSKQDSEYKSPGKHGDNVYIRTSEGDPRFKSSFYI 310
Db      241 ayrrgyflnnkqdgesyknpgkpdgvnyirirdeegdfhksfvi 285

RES 16
AAU00512
ID AAM85457 standard; Protein; 298 AA.
XX
AC AAM85457;
XX
DT 25-FEB-1999 (first entry)
DE Secreted protein encoded by clone ct864_4.
XX
KW Secreted protein; nutritional activity; immune stimulating; vaccine;
KW suppressing activity; haematopoiesis regulating activity;
KW tissue growth activity; activin; inhibin activity; chemotaxis;
KW chemokine activity; haemostasis; thrombolytic activity; receptor;
KW ligand; anti-inflammatory; cadherin; tumour invasion suppressor;
KW tumour inhibition; gene therapy.
XX
OS Homo sapiens.
XX
PN MO9842739-A2.
XX
PD 01-OCT-1998.
XX
PE 20-MAR-1998; 98WO-US05653.
XX
PR 19-MAR-1998; 98US-004466.
PR 21-MAR-1997; 97US-0822167.
XX
PA (GEMV ) GENETICS INST INC.
XX
PI Agostino MJ, Jacobs K, Lavallic ER, McCoy JM, Merberg D;
PI Racie LA, Spaulding V, Treacy M;
XX
DR MPI: 1998-609890/51.
DR N-PSDB: AAV82780.
XX
PT New polynucleotides encoding secreted human proteins - derived from
PT human foetal brain, adult brain, foetal kidney, placenta or adult
PT pleural gland cDNA libraries.
XX
PS Claim 17; Page 73-74; 113pp; English.
XX
CC The present sequence represents a secreted protein. The polynucleotide
CC and secreted protein are predicted to have biological activities which
CC would make them suitable for treating, preventing or ameliorating medical
CC conditions in humans and animals, although no supporting data is given.
CC Suggested activities include nutritional activity, immune stimulating
CC (e.g. as vaccines) or suppressing activity, haematopoiesis regulating
CC activity, tissue growth activity, activin/inhibin activity,
CC chemotactic/chemokinetic activity, haemostatic and thrombolytic activity,
CC receptor/ligand activity, anti-inflammatory activity, cadherin/tumour
CC invasion suppressor activity, and tumour inhibition activity (no data is
CC given in the specification to support these activities). The

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CC polynucleotide is also stated to be useful for gene therapy.
XX
SQ Sequence 298 AA:
Oy      3 LSRLRLRLVRLPHFLLFRGCMT----EAVNFI--NRNPVNH--EPESVELSCI 55
Db      1 marssrhl-----lllllylvalglyhkaygsfaukdgqvavavegeallac-k 51
Oy      56 THSGTSPRIFEMKXIQGCGTYYVFDKIKGDLAGRINWCKTSLRIWNTSRSDAIVRC 115
Db      52 tpkktvsrlmkwl-grvsfvygqltqdfdknra- jftrtknvtlsdaqkyrc 109
Oy      116 EVVALNDR-KEVDITIELIVQVKRPVPCRIPAANVYRLATLQCOSEGYPRPHYSWY 174
Db      110 evsapseggnlledvltvlelvavapvscvpsalsr-vvelrcqdkgnpneytwf 169
Oy      175 RNDVPLPTDSRANRPFQNSFHVNSEGTGLVENAVHKLISQYVCIASNDAGAACRCEG 234
Db      170 kdgrlrlleprlgsgsnssytmntktqqlqfvtvsklulgeyscearnsvgyrrcpqkr 229
Oy      235 MEYVDLNIAGTICGVLVVLYLAVITMGICAVRRCCTSSKQDGFSSKPGKHGDNVYI 294
Db      230 mqvddlnsgllaaqvvavalsvcglavcyarqkyt-ske-----tslqksnsska 282
Oy      295 RTSEGDPRFKSSFYI 310
Db      283 ttmseendtkhksfvi 298

RESULT 17
AAU00512
ID AAM85457 standard; Protein; 298 AA.
XX
AC AAM85457;
XX
DT 09-MAY-2001 (first entry)
DE Human junctional adhesion protein (JAM2).
XX
KW Junctional adhesion protein; JAM2; cellular localisation;
KW cellular expression; immunoprecipitation; stroke; phosphorylation;
KW glycosylation; paracellular migration; inflammatory disease-
KW arthritis; asthma; rheumatoid arthritis; inflammatory bowel disease;
KW Crohn's disease.
XX
OS Homo sapiens.
XX
FH Key
FH Peptide 1..20
FT /note- "Possible signal peptide #1"
FT Peptide 1..28
FT /note- "Possible signal peptide #2"
FT Protein 21..298
FT /note- "Possible mature JAM: #1"
FT Protein 29..298
FT /note- "Possible mature JAM: #2"
FT Domain 237..254
FT /note- "Transmembrane domain"
XX
PD MO200114404-A1.
XX
PD 01-MAR-2001.
XX
PR 23-AUG-2000; 2000WO-US23158.
PR 24-AUG-1999; 99US-0150459.
XX
PA (TEXA-) TEXAS BIOTECHNOLOGY CORP.

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XX  Cunningham S, Trindad Arrate Barros M;
PI
XX
XX  WPI: 2001-218425/22.
DR  N-PSDB: AAS00512.
XX
XX  Novel nucleic acids encoding human junctional adhesion protein useful
PT  for producing antibodies that are suitable for therapeutic purposes
XX
XX  Claim 4; Page 46-47; 51pp; English.
XX
XX  The sequence represents a human junctional adhesion molecule 2 (JAM2).
CC  The polynucleotide encoding the polypeptide is useful for recombinant
CC  production of JAM-2 protein, which in turn is useful for the production
CC  of antibodies. The antibodies may be used for probing cellular
CC  localisation and/or expression of JAM2 in tissues under normal and
CC  disease states, for immunoprecipitating JAM2 protein from cells and/or
CC  stroke tissues to determine whether it is modified by glycosylation and
CC  phosphorylation, and for determining JAM2 function. The antibodies
CC  inhibit interaction of JAM2 with inflammatory cells or influences their
CC  intracellular migration, and is therefore useful for alleviating
CC  inflammatory diseases such as arthritis, asthma, rheumatoid arthritis,
CC  inflammatory bowel disease and Crohn's disease.
XX
XX  Sequence 298 AA:
SQ

Query Match 30.9%; Score 505; DB 22; Length 298;
Best Local Similarity 37.3%; Pred. No. 4,3e-33;
Matches 118; Conservative 61; Mismatches 111; Indels 26; Gaps 9;

OY 3 LSRLRLRLVRLPHFLLLRGCM-----EAVNLKSSNRNPVH--EFESVELSCII 55
DB 1 mairstrhl-----lllllylvalgyhkaygfsapdkqyvtavxygeallac-k 51
OY 56 THSOSDPRIEKMKIQDQOTTYVYFDNKKIOGDLAQRTPVFGKTSIRINNVRRSDAIIIRC 115
DB 52 tpkktvxsrlwkl-gtvsstvyvqglgdfkrraeml-dfnrlknvtrsdagkyrc 109
OY 116 EVALANDR-KEVDITIELIVQVKPVPVCRIPAAVPGKATATLQCCSEGYPRHYMY 174
DB 110 evaspeegqglnedvtlevlvpavpsecpssalsqglvelrcqdkgnpapeytwf 169
OY 175 RNDVPLPDSRRANPRFQNSSEFHNSETGTLVFNVAHKDQGOYCIASNDAGARCEGOD 234
DB 170 kdgilnlnprtgsgtsysylnmktlgtlqfhtvskldtgsccaransvyrrcpqkr 229
OY 235 MEVYLNTAGITIGVLYLVAVITMGICCAVRGCFSSKODESEYKSPKHHGVYI 294
DB 230 mqvddlnsgllaavvvalvscvlgvyaqkyf--ske-----tsfqknsusska 282
OY 295 RTSEGDPRFHKSSFYI 310
DB 283 ttmseadfkhtksfil 298

RESULT 18
AAW75220
ID AAW75220 standard; Protein: 298 AA.
XX
XX  AAW75220;
XX
XX  29-JAN-1999 (first entry)
XX
XX  Human secreted protein encoded by gene 25 clone HTEB42.
XX
XX  Human: secreted protein; fusion protein; gene therapy; protein therapy;
XX  diagnosis; tissue; cancer; tumour; neurodegenerative disorder; leukaemia;
XX  developmental abnormality; foetal deficiency; blood; allergy; renal;
XX  immune system; asthma; lymphocytic disease; brain; hepatitis; lymphoma;
XX  inflammation; ischaemic shock; Alzheimer's disease; restenosis; AIDS;
XX  cognitive disorder; schizophrenia; prostate; obesity; osteoclast; thymus;
XX  osteoporosis; arthritis; testis; lung; thyroiditis; thyroid; digestion;

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KW endocrine; metabolism; regulation; malabsorption; gastritis; neoplasm.
XX
XX  Homo sapiens.
OS
XX
XX  Key Location/Qualifiers
FH Misc-difference 42 /label= unknown
FT Misc-difference 58 /label= unknown
FT
XX
XX  M09840483-A2.
XX
XX  17-SEP-1998.
XX
XX  12-MAR-1998; 98MO-US04858.
XX
XX  19-DEC-1997; 97US-0068368.
XX  14-MAR-1997; 97US-0040710.
XX  14-MAR-1997; 97US-0040762.
XX  30-MAY-1997; 97US-0048100.
XX  30-MAY-1997; 97US-0048189.
XX  30-MAY-1997; 97US-0048357.
XX  30-MAY-1997; 97US-0050934.
XX  06-JUN-1997; 97US-0048970.
XX  05-SEP-1997; 97US-0057765.
XX
XX  (HUMA-). HUMAN GENOME SCI INC.
XX
XX  Ferric AM, Fischer CL, Gentz RT, Greene JM, Kyaw H;
XX  Li H, Li Y, Moore PA, Rosen CA, Ruben SM, Soppet DR;
XX  Wei YF, Young PE, Zeng Z;
XX
XX  WPI: 1998-520811/44.
XX  N-PSDB: AAV34310.
XX
XX  Isolated human polynucleotide(s) encoding secretory peptide(s)
PT  used to develop products for the diagnosis and treatment of e.g.
PT  inflammation, cancers, CNS disorders or immune system disorders
XX
XX  Claim 1; Page 168-169; 201pp; English.
XX
XX  This sequence represents a secreted human protein encoded by the gene
XX  clone detailed in the descriptor line. The gene can be used to generate
XX  fusion proteins by linking to the gene to a human immunoglobulin Fc
XX  portion (e.g. AAV34277) for increasing the stability of the fused
XX  protein as compared to the human protein only.
XX  The invention relates to 28 novel genes and their fragments (nucleic
XX  acid sequences: AAV34286-34325; amino acid sequences AAW75196-75235)
XX  which are useful for preventing, treating or ameliorating medical
XX  conditions e.g. by protein or gene therapy. Also, pathological
XX  conditions can be diagnosed by determining the amount of the new
XX  polypeptides in a sample or by determining the presence of mutations in
XX  the new polynucleotides. Specific uses are described for each of the 28
XX  polynucleotides, based on which tissues they are most highly expressed in
XX  (see AAV34286 for described uses).
XX
XX  Sequence 298 AA:
SQ

Query Match 30.5%; Score 498; DB 19; Length 298;
Best Local Similarity 37.0%; Pred. No. 1,6e-32;
Matches 117; Conservative 61; Mismatches 112; Indels 26; Gaps 9;

OY 3 LSRLRLRLVRLPHFLLLRGCM-----EAVNLKSSNRNPVH--EFESVELSCII 55
DB 1 mairstrhl-----lllllylvalgyhkaygfsapdkqyvtavxygeallac-k 51
OY 56 THSOSDPRIEKMKIQDQOTTYVYFDNKKIOGDLAQRTPVFGKTSIRINNVRRSDAIIIRC 115
DB 52 tpkktvxsrlwkl-gtvsstvyvqglgdfkrraeml-dfnrlknvtrsdagkyrc 109
OY 116 EVALANDR-KEVDITIELIVQVKPVPVCRIPAAVPGKATATLQCCSEGYPRHYMY 174
DB 110 evaspeegqglnedvtlevlvpavpsecpssalsqglvelrcqdkgnpapeytwf 169

```


Db 110 evasapsegqguleedltvlevlavapavscvpssalsgtvvelrcdqegnpapeylwf 169
 QY 175 RNDVPLPTDSRANRPNFONSSFRHVSSETGLTFVNAVHKKDDSGOYCIASNDGAARCEGOD 234
 Db 170 kdgyrllepnlgsgtsnssymtkctgclqfntvskldtgeyscearssvgyrrcpqkr 229
 QY 235 MEVDLNIAGIGVLVLAVALITMGICCAVRRCGFISSKODGESYKSPKHDGVNYI 294
 Db 230 mqvddlnlsglaavvvalvsvcgjgvcyqgkyf--ske-----tsfqknsassa 282
 QY 295 RTSEGDFFRHKSFEVI 310
 Db 283 ttmsemdfkhhksfii 298

RESULT 19

AAB27273

ID AAB27273 standard; Protein: 298 AA.

AC AAB27273;

DT FEB-2001 (first entry)

DE Human confluency regulated adhesion molecule 2 #1.

XX Immunoglobulin superfamily; Ig SF; vascular adhesion molecule;

KW inflammation; cancer; wound; angiogenesis; human;

KM confluency regulated adhesion molecule 2; CRAM-2; JAM-3.

XX Homo sapiens.

OS WO200053749-A2.

XX 14-SEP-2000.

XX 13-MAR-2000; 2000WO-EP02219.

XX 11-MAR-1999; 99EP-0200746.

XX (RMPD-) RME DICTAGENE SA.

XX Imhof BA, Aurrand-Lions M;

XX WPI: 2000-587436/55.

XX Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or
 PT CRAM-2) polypeptide, useful for treatment of tumors, inflammation
 PT reactions and modulating vascular permeability

PS aim 1; Fig 3; 59pp; English.

XX The present sequence is the human confluency regulated adhesion molecule
 CC 2 (CRAM-2), also known as JAM-3). CRAM-2 is one of the vascular adhesion
 CC proteins of the immunoglobulin superfamily (Ig SF). The CRAM-2 protein
 CC and coding sequence can be used in the treatment of cancer, inflammation,
 CC to modulate cell-cell interactions and angiogenesis, and in the
 CC modulation of wound healing.

XX Sequence 298 AA;

Query Match 30.0%; Score 490.5; DB 21; Length 298;

Best Local Similarity 37.6%; Pred. No. 6.3e-32; Indels 27; Gaps 9;

Matches 117; Conservative 49; Mismatches 118; Indels 27; Gaps 9;

QY 13 ARLPHEFILLFRGCMIEAVNLKSSN-----RNPVHEFESVELSCITTHSOTSNDP 63
 Db 2 arspqgllmlllhylyvaldykangfsaskdhqevrvielfgeallac-klpkktss 60
 QY 64 RIEMKKIODGQTTYYVFDNRKIOGDLAGRTDVGKTSRLRIWNTSDSAIYRCEVALNDR 123
 Db 61 RIEMKKIYGGV-vslvygqalqgdfkdreaemi-dfnitrlknvtrsdageyrcevsapged 118

QY 124 -KEYDEITIELIVQKVTPTPCRIPAAPVPGKATLQOC-RSEGIPTPHNSYRNDVPLPT 182
 Db 119 gqnqgedkvmlelvvufavpaccrptssvmtgsvvvelrcdqegnpapeylwfkdg----t 174
 QY 183 DSRANP---FONSFFVNSETGLTFVNAVHKKDDSGOYCIASNDGAARCEGODEVYD 239
 Db 175 slgnpkygthnssvencnehsqllqfmmiskmdsge,czrtevgjhrtrcpqkrmqvdy 234
 QY 240 LNIAGIGVLVLAVALITMGICCAVRRCGFISSKK--SYKSPKHDGVNYIRTSEE 299
 Db 235 lnsgllatvvvvalvsvcgjgvcyqgkyf--sk-ghesp---askvltmge 287
 QY 300 GDPFRHKSFEVI 310
 Db 288 ndfthksfii 298

RESULT 20

AAB27275

ID AAB27275 standard; Protein: 298 AA.

AC AAB27275;

DT 23-FEB-2001 (first entry)

DE Murine confluency regulated adhesion molecule 2.

XX Immunoglobulin superfamily; Ig SF; vascular adhesion molecule;

KW inflammation; cancer; wound; angiogenesis; mouse;

KM confluency regulated adhesion molecule 2; CRAM-2; JAM-3.

XX Mus sp.

OS WO200053749-A2.

XX 14-SEP-2000.

XX 13-MAR-2000; 2000WO-EP02219.

XX 11-MAR-1999; 99EP-0200746.

XX (RMPD-) RME DICTAGENE SA.

XX Imhof BA, Aurrand-Lions M;

XX WPI: 2000-587436/55.

XX Isolated human Confluency Regulated Adhesion Molecule 1 or 2 (CRAM-1 or
 PT CRAM-2) polypeptide, useful for treatment of tumors, inflammation
 PT reactions and modulating vascular permeability

PS Example; Fig 5; 59pp; English.

XX The present sequence is the murine confluency regulated adhesion molecule
 CC 2 (CRAM-2), also known as JAM-3). CRAM-2 is one of the vascular adhesion
 CC proteins of the immunoglobulin superfamily (Ig SF). The CRAM-2 protein
 CC and coding sequence can be used in the treatment of cancer, inflammation,
 CC to modulate cell-cell interactions and angiogenesis, and in the
 CC modulation of wound healing.

XX Sequence 298 AA;

Query Match 30.0%; Score 490.5; DB 21; Length 298;

Best Local Similarity 37.6%; Pred. No. 6.3e-32; Indels 27; Gaps 9;

Matches 117; Conservative 49; Mismatches 118; Indels 27; Gaps 9;

QY 13 ARLPHEFILLFRGCMIEAVNLKSSN-----RNPVHEFESVELSCITTHSOTSNDP 63
 Db 2 arspqgllmlllhylyvaldykangfsaskdhqevrvielfgeallac-klpkktss 60
 QY 64 RIEMKKIODGQTTYYVFDNRKIOGDLAGRTDVGKTSRLRIWNTSDSAIYRCEVALNDR 123
 Db 61 RIEMKKIYGGV-vslvygqalqgdfkdreaemi-dfnitrlknvtrsdageyrcevsapged 118

Nucleic Acids Res. 17, 10321-10335, 1989
A:Title: Primary structure and developmental expression of a large cytoplasmic domain of
A:Reference number: S09600; MUID:90098871
A:Accession: S09600
A:Molecule type: mRNA
A:Residues: 1-1088 <R1>
A:Cross-references: EMBL:M25696; NID:q214609; PIDN:AAA49909.1; PID:q214610
A:Note: the authors translated the codon AAA for residue 970 as Leu
C:Comment: NCAM mediates cell-cell adhesion via homophilic binding with another NCAM mol
C:Genetics: Several forms of NCAM are produced by alternative splicing.
A:Gene: NCAM
C:Superfamily: neural cell adhesion molecule; fibronectin type III repeat homology; immu
C:Keywords: alternative splicing; brain; cell adhesion; duplication; heparin binding; s
F:1-19/Domin: signal sequence #status predicted <SIG>
F:20-1088/Product: neural cell adhesion molecule, long domain form #status predicted <L
F:20-803,1050-1088/Product: neural cell adhesion molecule, short domain form #status pre
F:20-703/Domin: extracellular #status predicted <EXT>
F:34-95/Domin: immunoglobulin homology <IMM1>
F:188/Domin: immunoglobulin homology <IMM2>
F:153/Region: heparin binding #status predicted
F:153-162/Region: heparin binding #status predicted
F:7284/Domin: immunoglobulin homology <IMM3>
F:881/Domin: immunoglobulin homology <IMM4>
F:443-475/Domin: immunoglobulin homology <IMM5>
F:512-589/Domin: fibronectin type III repeat homology <FN3A>
F:618-679/Domin: fibronectin type III repeat homology <FN3B>
F:706-723/Domin: transmembrane #status predicted <TM>
F:724-1088/Domin: intracellular #status predicted <INT>
F:41-93,136-186,232-282,323-379,420-473/Dissulfide bonds: #status predicted
F:219,310,341,417,443,472/Binding site: carbohydrate (asn) (covalent) #status predicted

Query Match 11.0%; Score 180; DB 1; Length 1088;
Best Local Similarity 28.8%; Pred. No. 1.2e-06;
Matches 60; Conservative 33; Mismatches 81; Indels 34; Gaps 11;

QY 32 VNLK-----SSNRNPVHEFESEVLSCTIHTSOTSDPR-IEWK-KIQDQTTYVYFDNKI 84
DB 107 VNLKIQKLTFFKNAPTPQEFKEGEDAVIICDVSSISPTIIRHKGKD-----VIFKKDV 161
QY 85 QGDLAGRIDVFEKTLRLINWTRSDSAIYRCF--VVALNDKREVDTEITELIVQKPVTP 142
DB 162 -----RFVVLANNYLQJRGIKRTDEGTYRCGRILA--RGEINKKDIQVIVNVPITQ 212
QY 143 V--CRIPAAVPGKTTATLQCOSEGYPRPHYSWYRNDVPLPTDSRANRPFQSSFFVNSE 200
DB 213 AROLVNAATANAESVYLSC-DADGPPDEISWLKKEPTEDGE-----EKISF--NED 263
QY 201 TGTLVNAVHKDDSGQYCIASNDGAA 228
DB 64 QSEMTIHVYKDEAEVSCIANNGEA 291

RESULT 3
A39712
kinase-like protein klg precursor - chicken
C:Species: Gallus gallus (chicken)
C:Date: 08-Nov-1991 #sequence_revision 08-Nov-1991 #text_change 24-Sep-1999
C:Accession: A39712
R:Chou, Y.H.; Hayman, M.J.
Proc. Natl. Acad. Sci. U.S.A. 88, 4897-4901, 1991
A:Title: Characterization of a member of the immunoglobulin gene superfamily that possib
A:Reference number: A39712; MUID:91271300
A:Accession: A39712
A:Status: Preliminary
A:Molecule type: mRNA
A:Residues: 1-1051 <CHO>
A:Cross-references: GB:M63437; NID:q212235; PIDN:AAA48933.1; PID:q212236
C:Superfamily: unassigned Ser/Thr or Tyr-specific protein kinases; protein kinase homolo
C:Keywords: ATP
F:775-1046/Domin: protein kinase homology <KIN>
F:783-791/Region: protein kinase ATP-binding motif

Query Match 10.9%; Score 178; DB 2; Length 1051;
Best Local Similarity 28.3%; Pred. No. 1.7e-06;
Matches 72; Conservative 29; Mismatches 109; Indels 44; Gaps 12;

QY 45 EF-ESVELSCITHTSOTSDPRIEMKKIQDQTTYVYFDNKIQGLDLAGRDVFGKTSRLTW 103
DB 496 ENKEVTVYSCSATGRG-KPTIQWTK-RDQ-----SLPSVSHRAGI-----LSFH 539
QY 104 NVTSDSAIYRCFVVALNDKREVDTEITELIVQKPVTPVPCIPAAVPGKTTATLQCOES 163
DB 540 KYSRSDSGWYTC--IANSPOGEIRATYQVLAAYVYTFKLEDEPTTYVQGHAMFOCO-A 596
QY 164 EGYPRPHYSWYRNDVPLPTDSRANRPFQSSPHVNSEGTILFVNAVHKDDSGQYCIASN 223
DB 597 EDDPVPPIHOMKKDKIL-DPSKILPRIQ-----IMPNSLIYDYTTEDSGKYCIACN 649
QY 224 DA-----GAARCEQDMEV-YD-LNIAGIIGVLLVLAIVTIGICCA 266
DB 650 SCNIKREAFLYVDKPALEEDEGSPSHPTKMIQTIGLSGAAVAAYIIVGLMFYCKK 709
QY 267 YRRCGFISKKDGE 280
DB 710 RRRKANRLKKHPEGE 723

RESULT 4
A31923
amalgam protein precursor - fruit fly (Drosophila melanogaster)
C:Species: Drosophila melanogaster
C:Date: 18-Oct-1989 #sequence_revision 18-Oct-1989 #text_change 21-Jul-2000
R:Seeger, M.A.; Hatfield, L.; Kaufman, T.C.
Cell 55, 589-600, 1988
A:Title: Characterization of amalgam: a member of the immunoglobulin superfamily from
A:Reference number: A31923; MUID:89028670
A:Accession: A31923
A:Molecule type: DNA
A:Residues: 1-333 <SEB>
A:Cross-references: GB:M23561; NID:q156920; PIDN:AAA28367.1; PID:q156921
C:Genetics:
A:Gene: Flybase:ama
A:Cross-references: Flybase:FBgn0000071

Query Match 10.8%; Score 177; DB 2; Length 333;
Best Local Similarity 27.2%; Pred. No. 5.4e-07;
Matches 53; Conservative 38; Mismatches 82; Indels 22; Gaps 6;

QY 35 KSSNRNPVHEFESEVLSCTIHTSQ-TSDPRIEMKKIQDQTTYVYFDNKIQGLDLAGRTD 93
DB 143 ENTPKSTLYTEGONLELT--HANGFPKTIISMARENAV-----HPAGH 186
QY 94 VEGKTSRLINWTRSDSAIYRCFVVALNDKREVDTEITELIVQKPVTPVPCIPAAVPG 153
DB 187 LLAEPFLRLRSVHRMDRGYYC--IAQNGEQPDRLILVEEFRRQLAVQAPKIAOMVS 244
QY 154 KTTATLQCOSEGYPRPHYSWYRNDVPLPTDSRANRPFQSSPHVNSEGTILFVNAVHKD 213
DB 245 HSAELEEC-SVQGYPAFTVVMHKNRNVPL--QSSRHHEVANTASSSGTITSVLRLIDSVGED 301
QY 214 SGOYCYCIASNDGAA 228
DB 302 FGDYTCNATNKLGAH 316

RESULT 5
I3RTNC
neural cell adhesion molecule short domain form precursor - rat
C:Species: Rattus norvegicus (Norway rat)
N:Alternate names: NCAM-140
C:Date: 30-Sep-1991 #sequence_revision 30-Sep-1991 #text_change 22-Jun-1999

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OM protein - protein search, using sw model

Run on: August 6, 2001, 09:33:40 ; Search time 13.3 Seconds

(without alignments)
798.436 Million cell updates/sec

Title: US-09-524-531A-13

Perfect score: 1633
Sequence: 1 MALSRRLRLRLYLARLPHPFL.....VNYIRTSEGDGRHKSFEVI 310

Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Sequences: 93435 seqs, 34255486 residues

Number of hits satisfying chosen parameters: 93435

Minimum DB seq length: 0
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%
Maximum Match 100%

Listing first 45 summaries

Database : SwissProt_39.*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	505	30.9	298	1	VEJA_HUMAN
2	449.5	27.5	300	1	JAM1_MOUSE
3	415	25.4	299	1	JAM1_HUMAN
4	409.5	25.1	298	1	JAM1_BOVIN
5	242.5	14.8	319	1	A33_HUMAN
6	180	11.0	1088	1	NCA1_XENLA
7	178	10.9	1051	1	PTK7_CHICK
8	177	10.8	333	1	AMAL_DROME
9	172.5	10.6	365	1	CXAR_HUMAN
10	172.5	10.6	837	1	NCA2_MOUSE
11	172.5	10.6	858	1	NCA1_RAT
12	170	10.4	349	1	LACH_SCHAM
13	169.5	10.4	725	1	NCA2_MOUSE
14	169.5	10.4	1115	1	NCA1_MOUSE
15	169	10.3	1092	1	NCA2_XENLA
16	167.5	10.3	837	1	NCA2_MOUSE
17	167.5	10.3	3707	1	PGKM_MOUSE
18	164.5	10.1	853	1	NCA1_BOVIN
19	163	10.0	761	1	NCA2_HUMAN
20	163	10.0	848	1	NCA1_HUMAN
21	161	9.9	1377	1	NEOL_RAT
22	159	9.7	1091	1	NCA1_CHICK
23	156	9.6	344	1	NTR1_RAT
24	156	9.6	1493	1	NEOI_MOUSE
25	155	9.5	353	1	CEBU_CHICK
26	151.5	9.3	365	1	CXAR_MOUSE
27	151.5	9.3	811	1	FS22_DROME
28	151.5	9.3	873	1	FS21_DROME
29	151	9.2	1912	1	PTPD_HUMAN
30	150	9.2	1694	1	SN_MOUSE
31	149.5	9.2	4393	1	PGKM_HUMAN
32	148.5	9.1	1070	1	PTK7_HUMAN
33	148.5	9.1	1461	1	NEOL_HUMAN

34	148	9.1	1040	1	AXO1_HUMAN	Q02246	homo sapien
35	148	9.1	1040	1	AXO1_RAT	P22063	rattus norv
36	147.5	8.9	359	1	LACH_DROME	Q24372	drosophila
37	145	8.9	702	1	CCEM_HUMAN	P06731	homo sapien
38	144.5	8.8	521	1	BGPI_MOUSE	P31809	mus musculu
39	144	8.8	1443	1	NEOI_CHICK	Q90610	gallus gall
40	143.5	8.8	345	1	OPCM_BOVIN	P1834	bos taurus
41	143	8.8	1260	1	CAML_RAT	P32736	rattus norv
42	142.5	8.7	1447	1	DCC_MOUSE	P1627	mus musculu
43	142.5	8.7	2012	1	DSCA_HUMAN	P70211	mus musculu
44	142.5	8.6				O60469	homo sapien
45	140.5						

ALIGNMENTS

RESULT	1	VEJA_HUMAN	STANDARD	PRT	298 AA.
ID	VEJA_HUMAN				
AC	P57087				
DT	01-OCT-2000 (Rel. 40, Created)				
DT	01-OCT-2000 (Rel. 40, Last sequence update)				
DT	01-OCT-2000 (Rel. 40, Last annotation update)				
DE	VASCULAR ENDOTHELIAL JUNCTION-ASSOCIATED MOLECULE PRECURSOR (VE-JAM).				
GN	C21ORF43.				
OS	Homo sapiens (Human).				
OC	Eukaryota; Metazoa; Chordata; Vertebrata; Euteleostomi;				
OC	Mammalia; Eutheria; Primates; Catarrhini; Homnidae; Homo.				
OX	NCBI_Taxid=9606;				
RN	(1)				
RP	SEQUENCE FROM N.A.				
RC	TISSUE-Vascular endothelial cells;				
RX	MEDLINE=20317114; Pubmed=10779521;				
RA	Palmeri D., van Zante A., Huang C.C., Hemmerich S., Rosen S.D.;				
RT	"Vascular endothelial junction-associated molecule, a novel member of				
RT	the immunoglobulin superfamily, is localized to intercellular				
RT	boundaries of endothelial cells.";				
RL	J. Biol. Chem. 275:19139-19145(2000).				
CC	- FUNCTION: MAY PLAY A ROLE IN THE PROCESSES OF LYMPHOCYTE HOMING TO				
CC	SECONDARY LYMPHOID ORGANS.				
CC	- SUBCELLULAR LOCATION: TYPE I MEMBRANE PROTEIN (POTENTIAL).				
CC	- TISSUE SPECIFICITY: PROMINENTLY EXPRESSED ON HIGH ENDOTHELIAL				
CC	VENULES BUT IS ALSO PRESENT ON THE ENDOTHELIA OF OTHER VESSELS.				
CC	LOCALIZED TO THE INTERCELLULAR BOUNDARIES OF HIGH ENDOTHELIAL				
CC	CELLS.				
CC	- SIMILARITY: CONTAINS 1 IMMUNOGLOBULIN-LIKE V-TYPE DOMAIN.				
CC	- SIMILARITY: CONTAINS 1 IMMUNOGLOBULIN-LIKE C2-TYPE DOMAIN.				
CC	- This SWISS-PROT entry is copyright. It is produced through a collaboration				
CC	between the Swiss Institute of Bioinformatics and the EMBL outstation -				
CC	the European Bioinformatics Institute. There are no restrictions on its				
CC	use by non-profit institutions as long as its content is in no way				
CC	modified and this statement is not removed. Usage by and for commercial				
CC	entities requires a license agreement (See http://www.isb-sib.ch/announce/				
CC	or send an email to license@sib-sib.ch).				
DR	EMBL: AF255910; AAF81223.1; -				
KW	Immunoglobulin domain; Glycoprotein; Transmembrane; Signal.				
FT	SIGNAL	1	20		POTENTIAL.
FT	CHAIN	21	298		POTENTIAL.
FT	DOMAIN	21	238		EXTRACELLULAR (POTENTIAL).
FT	TRANSMEM	239	259		POTENTIAL.
FT	DOMAIN	260	298		CYTOPLASMIC (POTENTIAL).
FT	DOMAIN	43	116		IG-LIKE V-TYPE DOMAIN.
FT	DOMAIN	148	221		IG-LIKE C2-TYPE DOMAIN.
FT	DISULFID	50	109		POTENTIAL.
FT	DISULFID	155	214		POTENTIAL.
FT	CARBOHYD	98	98		N-LINKED (GLCNAC. . .) (POTENTIAL).
FT	CARBOHYD	187	187		N-LINKED (GLCNAC. . .) (POTENTIAL).
FT	CARBOHYD	236	236		N-LINKED (GLCNAC. . .) (POTENTIAL).
FT	SEQUENCE	298 AA.	33207 MW;		CAV8E518E22DCAEE CRC64;

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OM protein - protein search, using sw model

Run on: August 6, 2001, 09:33:10 ; Search time 35.5 Seconds
(without alignments)
1155.340 Million cell updates/sec

Title: US-09-524-531a-13

Sequence: 1 MALSRLRLRLVRLPDPFLLLFRCMCIEAVNLKSSNRNPVHFESEVLSCTITDSOT 310

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Sequences: 425026 seqs, 132305027 residues

Total number of hits satisfying chosen parameters: 425026

Minimum DB seq length: 0
Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%

Maximum Match 100%
Listing first 45 summaries

Database :

1: SPREMBL_16:*
2: SP_archaea:*
3: SP_bacteria:*
4: SP_fungi:*
5: SP_human:*
6: SP_invertebrate:*
7: SP_mammal:*
8: SP_mhc:*
9: SP_organella:*
10: SP_phage:*
11: SP_plant:*
12: SP_rodent:*
13: SP_unclassified:*
14: SP_virus:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	1615	98.9	310	11	Q9EPK4 mus musculus
2	497.5	30.5	298	11	Q9J159 mus musculus
3	450.5	27.6	300	11	Q9JHY1 rattus norv
4	340	20.8	259	4	Q9Y5B2 homo sapien
5	321	19.7	173	11	Q9IKD5 rattus norv
6	257	15.7	318	13	Q91664 xenopus lae
7	240.5	14.7	319	11	Q91KAS mus musculus
8	219	13.4	325	4	Q95791 homo sapien
9	214	13.1	335	13	Q9PWR4 gallus galli
10	213	13.0	284	4	Q9NKA2 mus musculus
11	212	13.0	328	11	Q92109 mus musculus
12	209.5	12.8	335	13	Q9YGH1 gallus galli
13	208	12.7	335	13	Q9YGV5 gallus galli
14	199	12.2	181	13	Q91665 xenopus lae
15	197	12.1	259	4	Q95532 homo sapien
16	182.5	11.2	358	13	Q90490 brachydanio
17	181	11.1	725	13	Q73633 xenopus lae
18	177	10.6	333	5	Q9V3AS drosophila
19	174.5	10.7	319	6	Q9TUB0 canis faml

20	172.5	10.6	344	4	Q9UKV4	Q9UKV4 homo sapien
21	169	10.3	725	13	Q73634	Q73634 xenopus lae
22	168.5	10.3	935	5	Q9VW27	Q9VW27 drosophila
23	168	10.3	340	11	Q61349	Q61349 mus musculus
24	167.5	10.3	6442	5	Q01761	Q01761 caenorhabd
25	166	10.2	483	4	Q9UPI4	Q9UPI4 homo sapien
26	165.5	10.1	1496	4	Q92626	Q92626 homo sapien
27	164.5	10.1	352	5	Q76697	Q76697 caenorhabd
28	164.5	10.1	733	4	Q9H6B4	Q9H6B4 homo sapien
29	164	10.0	3962	4	Q10465	Q10465 homo sapien
30	163	10.0	344	4	Q9PI21	Q9PI21 homo sapien
31	163	10.0	381	4	Q9Y4A4	Q9Y4A4 homo sapien
32	162	9.9	5198	5	Q76518	Q76518 caenorhabd
33	161	9.9	351	5	Q9V0Y0	Q9V0Y0 drosophila
34	160	9.8	869	4	Q15146	Q15146 homo sapien
35	160	9.8	875	5	Q76698	Q76698 caenorhabd
36	160	9.8	1083	5	Q9U4D1	Q9U4D1 caenorhabd
37	160	9.8	1482	5	Q9V4Y0	Q9V4Y0 drosophila
38	159.5	9.8	1277	13	Q98902	Q98902 fugu rubrip
39	158.5	9.7	319	6	Q9T079	Q9T079 sus scrofa
40	158.5	9.7	858	5	Q18466	Q18466 hirudo medi
41	158.5	9.7	1252	11	Q9E0S9	Q9E0S9 mus musculus
42	158.5	9.7	1253	11	Q9E0S8	Q9E0S8 mus musculus
43	157	9.6	315	13	Q57596	Q57596 gallus galli
44	157	9.6	315	13	Q9DG15	Q9DG15 gallus galli
45	157	9.6	344	13	Q93242	Q93242 gallus galli

ALIGNMENTS

RESULT 1
Q9EPK4 PRELIMINARY: PRT: 310 AA.

AC Q9EPK4: 01-MAR-2001 (TREMBLrel. 16, Created)
DT 01-MAR-2001 (TREMBLrel. 16, last sequence update)
DT 01-MAR-2001 (TREMBLrel. 16, last annotation update)
DE JUNCTIONAL ADHESION MOLECULE-2, JAM-2.
GN JAM-2.
OS Mus musculus (Mouse).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
OC Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Mus.
OX NCBI_TaxID=10090;
RN [1]
RP SEQUENCE FROM N.A.
RX PubMed=11036763;
RA Aurand-Lions M.A., Duncan L., Du Pasquier L., Imhof B.A.;
RT "Cloning of JAM-2 and JAM-3: an Emerging Junctional Adhesion Molecular
RT Family?";
RL Curr. Top. Microbiol. Immunol. 251:91-98(2000).
DR EMBL: AJ300304; CAC20704.1; -
SQ SEQUENCE 310 AA; 34837 MW; 4B92BCB51D0A8B0A CRC64;

Query Match 98.9%; Score 1615; DB 11; Length 310;
Best local Similarity 99.4%; Pred. No. 2.2e-153;
Matches 308; Conservative 0; Mismatches 2; Indels 0; Gaps 0;

QY 1 MALSRLRLVRLPDPFLLLFRCMCIEAVNLKSSNRNPVHFESEVLSCTITDSOT 60
|||||
QY 1 MALSRLRLVRLPDPFLLLFRCMCIEAVNLKSSNRNPVHFESEVLSCTITDSOT 60
|||||
Db 1 MALSRLRLVRLPDPFLLLFRCMCIEAVNLKSSNRNPVHFESEVLSCTITDSOT 60
|||||
QY 61 SDRIRMKKTQDQCTYYVFDNKTQDGLGRVDPKTSIRINVTNRSAIRCVALL 120
|||||
Db 61 SDRIRMKKTQDQCTYYVFDNKTQDGLGRVDPKTSIRINVTNRSAIRCVALL 120
|||||
QY 121 NDRKEVDEITIELIVQKPTVPYCIPAAVPGKATLQCESEGYPRPHYSRYRDVPL 180
|||||
Db 121 NDRKEVDEITIELIVQKPTVPYCIPAAVPGKATLQCESEGYPRPHYSRYRDVPL 180
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QY 181 PTDSRRNPRFQNSFHVNSFETGLVFNVAHKDSDGYCTIASNDAGACRCEGDMEVYDL 240
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Db 181 PTDSPANRPFONSSPHVNSTGTGVFNAVHKDDSGQYCIASNDAGAACRCQDMEVYDL 240
Qy 241 NIAGTIGVLLVLYLAVITMGICCAVRRGCFISSKODESYKSPGKHGVMYIRTSSEG 300
Db 241 NIAGTIGVLLVLYLAVITMGICCAVRRGCFISSKODESYKSPGKHGVMYIRTSSEG 300
Qy 301 DFRHKSFEVI 310
Db 301 DFRHKSFEVI 310

RESULT 2
ID 09J159 PRELIMINARY; PRT: 298 AA.
AC 09J159;
DT 01-OCT-2000 (TREMBLrel. 15, Created)
DT 01-OCT-2000 (TREMBLrel. 15, Last sequence update)
DT 01-MAR-2001 (TREMBLrel. 16, Last annotation update)
DE VASCULAR ENDOTHELIAL JUNCTION-ASSOCIATED MOLECULE (JUNCTIONAL ADHESION MOLECULE-3).
GN AM-3.
OS Mus musculus (Mouse).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Mus.
NCBI_TaxID=10090;
RN [1]
RP SEQUENCE FROM N.A.
RC STRAIN=C57BL/6J;
RX MEDLINE=20317114; PubMed=10779521;
RA Palmeri D., van Zante A., Huang C.-C., Hemmerich S., Rosen S.D.; "Vascular Endothelial Junction-associated Molecule, a Novel Member of the Immunoglobulin Superfamily, is Localized to Intercellular Boundaries of Endothelial Cells."; J. Biol. Chem. 275:19139-19145(2000).
RN [2]
RP SEQUENCE FROM N.A.
RX PubMed=11036763;
RA Aurand-Lions M.A., Duncan L., Du Pasquier L., Imhof B.A.; "Cloning of JAM-2 and JAM-3: an Emerging Junctional Adhesion Molecular Family?"; Curr. Top. Microbiol. Immunol. 251:91-98(2000).
DR EMBL; AF255911; AAF81224.1; -;
DR InterPro; IPR003006; -;
DR Pfam; PF00047; 1g; 2.
DR SMART; SM00408; IGC2; 1.
SQ SEQUENCE 298 AA; 33047 MW; 1124E0F07B6CF751 CRC64;

Query Match 30.5%; Score 497.5; DB 11; Length 298;
Best Local Similarity 37.3%; Pred. No. 1.5e-41;
Matches 116; Conservative 53; Mismatches 115; Indels 27; Gaps 9;

Db 13 ARLPFFLLFRGCMIEAVNLKSSN-----RNPVHEFESVELSCITHSQTSDP 63
Qy 13 ARLPFFLLFRGCMIEAVNLKSSN-----RNPVHEFESVELSCITHSQTSDP 63
Db 2 AASPOGLMLLHLHYLALDYHKANGFSASKDHQEVYVIEFOALLAC-KTPKKTSS 60
Qy 64 RIEMKKIDGGQTYTYVFNKIGDLAGRTDVFGKTSLRIMNTSRDSATIRCEVALNDR 123
Db 61 RIEMKKVGG-VSLVYQOALOGDKFRDAEM-DENIRKNTSRDAGRYCEVSAPEEQ 118
Qy 124 -KEVDITIELIVQKPVTPCRIPAAVPGKTATLLOCESGYPSPHYSWRNVPPLPT 182
Db 119 GONLOEDKMLEVLYAPAVPACVPTSVATGSLVVELRCDKRGNAPEYIKDG-----T 174
Qy 183 DSRANP---FONSSFVNSETGTLVFNVAHVHKKDSCQYCIASNDAGACRCQDMEVYD 239
Db 175 SLGNPKGKTHNNSSTYMTKSGILOFNMIKMDGSEYCEARNVGHRRCPGKRQVDV 234
Qy 240 LNIAGTIGVLLVLYLAVITMGICCAVRRGCFISSKODESYKSPGKHGVMYIRTSSE 299
Db 235 LNIAGTIGVLLVLYLAVITMGICCAVRRGCFISSKODESYKSPGKHGVMYIRTSSE 287

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Qy 300 GDFRHKSSFEVI 310
Db 288 NDFKHTKSFII 298

RESULT 3
ID 09JHY1 PRELIMINARY; PRT: 300 AA.
AC 09JHY1;
DT 01-OCT-2000 (TREMBLrel. 15, Created)
DT 01-OCT-2000 (TREMBLrel. 15, Last sequence update)
DT 01-MAR-2001 (TREMBLrel. 16, Last annotation update)
DE JUNCTIONAL ADHESION MOLECULE JAM.
GN JAM.
OS Rattus norvegicus (Rat).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Murinae; Rattus.
NCBI_TaxID=10116;
RN [1]
RP SEQUENCE FROM N.A.
RC STRAIN=SPRAGUE DAWLEY;
RA Mashima H., Kojima I.; Submitted (JUN-2000) to the EMBL/GenBank/DBJ databases.
DR EMBL; AF276998; AAF78250.1; -;
DR InterPro; IPR003006; -;
DR InterPro; IPR003596; -;
DR Pfam; PF00047; 1g; 2.
DR SMART; SM00406; IGV; 1.
SQ SEQUENCE 300 AA; 32369 MW; 45AE362A96158BFA CRC64;

Query Match 27.6%; Score 450.5; DB 11; Length 300;
Best Local Similarity 38.0%; Pred. No. 7.4e-37;
Matches 114; Conservative 52; Mismatches 115; Indels 19; Gaps 10;

Qy 20 LLLFRGCMIEAVNLKSSNRP-----VVEFESVELSCITHSQTSDPRIEMKKIDGQ 74
Db 11 LLLFRGCMIEAVNLKSSNRP-----VVEFESVELSCITHSQTSDPRIEMKKIDGQ 74
Qy 75 TTYVFFDNKIGDLAGRTDVFGKTSLRIMNTSRDSATIRCEVALNDRKEVDITIELI 134
Db 69 TALVCYNNQITVPYADRY-TESSSGITPSSVTRKNGEYTC-MVEDSGQNGEVSILHT 126
Qy 135 VOYKPVTPVCRIPAAVPGKTATLLOCESGYPSPHYSWRNVPPLPT-DSRANRPFONS 193
Db 127 VLVPPSKPVTSLPSSVTIGNRAVLTCSEHDSPPSEYGFMDGVMPLTADAKKTRAFINS 186
Qy 194 SFVNSETGTLVFNVAHVHKKDSCQYCIASNDAGAA-KCEGQDMEVYDLNIAIGTIGV 252
Db 187 SYTIDPKSGDILFEDVPSAFDSGCEYCEAQNCGYGTAMRSEAVMEAEVLNCGIVAALVT 246
Qy 253 LTVLAVITMGICCAVRRGCFISSKODESYKSPGKHGVMYIRTS--EEGDFRHKSSFEVI 310
Db 247 LLLGLLFIQWIFAVSRGFEYTKRG---TAPGKR--VIYSQPSARSEGEKQTSFSLV 300

RESULT 4
ID 09Y5B2 PRELIMINARY; PRT: 259 AA.
AC 09Y5B2;
DT 01-NOV-1999 (TREMBLrel. 12, Created)
DT 01-NOV-1999 (TREMBLrel. 12, Last sequence update)
DT 01-MAR-2001 (TREMBLrel. 16, Last annotation update)
DE JUNCTION ADHESION MOLECULE.
OS Homo sapiens (Human).
OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi; Mammalia; Eutheria; Primates; Catarrhini; Homiidae; Homo.
NCBI_TaxID=9606;
RN [1]
RP SEQUENCE FROM N.A.
RA Liu Y., Nusrat A., Schnell F.J., Walsh S., Reaves T.A., Pochet M., Foley C., Parkos C.A.;

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GenCore version 4.5
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OM protein - protein search, using sw model

Run on: August 6, 2001, 09:31:09 ; Search time 19.31 Seconds

(without alignments)
330.554 Million cell updates/sec

Title: US-09-524-531a-13

Perfect score: 1633

Sequence: 1 MALSRRRLRLRLYLARLPHEFL.....VNYITSEGDGRHKSSEVI 310

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Sequences: 197339 seqs, 20590346 residues

Maximum DB seq length: 0

Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%

Database : Issued_Patents_AA:*

- 1: /cgn2_6/ptodata/1/1aa/5a_COMB.pep:*
- 2: /cgn2_6/ptodata/1/1aa/5b_COMB.pep:*
- 3: /cgn2_6/ptodata/1/1aa/6a_COMB.pep:*
- 4: /cgn2_6/ptodata/1/1aa/6b_COMB.pep:*
- 5: /cgn2_6/ptodata/1/1aa/6c_COMB.pep:*
- 6: /cgn2_6/ptodata/1/1aa/6d_COMB.pep:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result	Score	Query Match	Length	DB	ID	Description
1	415	25.4	299	4	US-09-188-930-331	Sequence 331, App
2	403	24.7	299	4	US-09-188-930-189	Sequence 189, App
3	242.5	14.8	319	1	US-08-597-495B-22	Sequence 22, App1
4	173.5	10.6	365	4	US-08-928-383B-2	Sequence 2, App1
5	172.5	10.6	365	2	US-08-979-424-3	Sequence 3, App1
6	172.5	10.6	365	4	US-09-272-496-2	Sequence 2, App1
7	171.5	10.5	390	2	US-08-979-424-1	Sequence 1, App1
8	166	10.2	1101	3	US-08-986-485-2	Sequence 2, App1
9	160	9.8	869	2	US-08-374-834-16	Sequence 29, App1
10	156.5	9.6	365	4	US-08-928-383B-23	Sequence 23, App1
11	156.5	9.6	365	4	US-08-928-383B-24	Sequence 24, App1
12	151.5	9.3	365	4	US-08-928-383B-26	Sequence 26, App1
13	151.5	9.3	1091	3	US-08-986-485-5	Sequence 5, App1
14	148	9.1	607	2	US-08-752-307B-12	Sequence 12, App1
15	147.5	9.0	501	2	US-08-408-095-31	Sequence 31, App1
16	147.5	9.0	95	4	US-08-928-383B-18	Sequence 18, App1
17	146.5	9.0	478	5	PCT-US95-08493-15	Sequence 15, App1
18	146.5	9.0	860	5	PCT-US95-08493-19	Sequence 19, App1
19	146.5	9.0	868	5	PCT-US95-08493-21	Sequence 21, App1
20	144.5	8.8	734	2	US-08-602-725-36	Sequence 36, App1
21	144.5	8.8	734	2	US-08-389-459A-17	Sequence 17, App1
22	144.5	8.8	734	3	US-08-987-867A-17	Sequence 17, App1
23	144.5	8.8	868	2	US-08-374-834-1	Sequence 1, App1
24	144.5	8.8	868	2	US-08-644-271-1	Sequence 1, App1
25	141	8.6	338	2	US-08-414-657D-60	Sequence 60, App1
26	141	8.6	642	1	US-08-217-299-1	Sequence 1, App1
27	141	8.6	642	1	US-08-217-299-1	Sequence 1, App1

28	141	8.6	1501	2	US-08-447-464-3	Sequence 3, App1
29	141	8.6	1501	2	US-08-716-679-3	Sequence 3, App1
30	139.5	8.5	612	2	US-08-752-307B-11	Sequence 11, App1
31	139.5	8.5	1447	4	US-09-041-886-25	Sequence 25, App1
32	139.5	8.5	1447	5	PCT-US94-05277-2	Sequence 2, App1
33	139	8.5	310	2	US-08-414-657D-45	Sequence 45, App1
34	139	8.5	310	2	US-08-414-657D-42	Sequence 42, App1
35	139	8.5	310	2	US-08-414-657D-43	Sequence 43, App1
36	138.5	8.5	252	2	US-08-414-657D-56	Sequence 56, App1
37	138.5	8.5	252	2	US-08-414-657D-57	Sequence 57, App1
38	138.5	8.5	287	2	US-08-414-657D-48	Sequence 48, App1
39	138.5	8.5	287	2	US-08-414-657D-49	Sequence 49, App1
40	138.5	8.5	304	2	US-08-414-657D-44	Sequence 44, App1
41	138.5	8.5	308	2	US-08-414-657D-46	Sequence 46, App1
42	138.5	8.5	315	2	US-08-414-657D-47	Sequence 47, App1
43	138.5	8.5	325	2	US-08-414-657D-2	Sequence 2, App1
44	138.5	8.5	325	2	US-08-414-657D-41	Sequence 41, App1
45	135.5	8.3	662	1	US-08-261-304-7	Sequence 7, App1

ALIGNMENTS

```

RESULT 1
US-09-188-930-331
Sequence 331, Application US/09188930A
Patent No. 6150502
GENERAL INFORMATION:
APPLICANT: Watson, James D.
APPLICANT: Strachan, Lorna
APPLICANT: Sleeman, Matthew
APPLICANT: Onrust, Rene
APPLICANT: Murison, James Greg
TITLE OF INVENTION: Compositions Isolated From Skin Cells
FILE REFERENCE: 11000.1011c
CURRENT APPLICATION NUMBER: US/09/188,930A
CURRENT FILING DATE: 1998-11-09
NUMBER OF SEQ ID NOS: 348
SOFTWARE: FastSeq for Windows Version 3.0
SEQ ID NO 331
LENGTH: 299
TYPE: PRT
ORGANISM: Human
US-09-188-930-331

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Query Match 25.4% Score 415, DB 4; Length 299;

Best Local Similarity 33.8% Pred. No. 7.4e-34; Mismatches 100; Conservative 50; Mismatches 132; Indels 14; Gaps 6;

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18 FFLILLFRGCMIEAVNKKSSNRNPVHFEFSEVLCITITSSONSDDPRIKKIIOGGOTTY 77
15 FILAILLCSIALGSLVYHSSEPEYRIPENNPKLSC--AISGFSPEVEMKFDGGDTTRL 72
78 VFEDNKIOGCLAGRTDVFGRKTSLRINNVTRSDSAIYRCFVVALNDKREVEITIELIVQV 137
73 VCVNNKKTATAYEDRV-TFLPTGTFIKFVTRREDTGTYIC-NVSEBGSYGEVAKLVIV 130
138 KPVTPVCRIIPAAYPVGKTATLQCOESEGYRPHYSWYRNDVPLPTDSRANPRONSSFEHV 197
131 PPSKPTVNISSATIGRAVLTCSEODGSPSEYTWFKDGIWPTNPKSTRAFSSNSYVL 190
198 NSEGTGLVFNAVHKDSCGYCIASNDAGARCEGO-DMEYDNLNAGITIGVLYVLYV 256
191 NPTTGLVFPPLASPDGEXSCERNGYGPMTSNNAVRAVERNGVIAAVALVTLTL 250
257 AVLTMGICAYRRGCFISSKODESYKSPGKHGCVNVIKTS--EEGDFRHKSSFEVI 310
251 GILVFGIWFAYRSGHDPRTKKTSSKR-----VIISQPSANSBGEFKOTSSFLV 299

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